

**A Governance Framework for
Sustainable Development in the Built Environment**

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Abstract

This project was inspired by a declaration made by built environment professionals at the World Summit on Sustainable Development (GABS, 2002), of the need for a common framework to improve decision making for sustainable development. Priori theorising indicated the suitability of governance as a topic of consideration and the possibility that a governance framework offered a potential solution. The research question was therefore: “would a governance framework for the built environment sector provide a framework in which decision making for sustainable development could be improved for all built environment stakeholders?” With an added dimension of testing for developed and developing countries, the research project was constructed on the case study methodology using the built environment sectors of the UK and Ghana.

The project commenced with a review of literature which confirmed that governance is a core component of sustainable development and of increasing relevance to built environment stakeholders in both developed and developing countries. A significant gap in the literature concerning governance and the built environment sector was identified. Through analysis of literature a governance framework was constructed to act as the theoretical framework for testing. A comparative analysis of the current governance arrangements impacting on the built environment sectors in each of the case studies provided data to test the theoretical framework. A contingency valuation carried out with built environment policy makers and practitioners in Ghana provided data to further test the acceptability and applicability of the theoretical governance framework.

It was concluded that a governance framework provided a robust framework in which decision making for sustainable development could be analysed and improved. Furthermore, evidence indicates that the completeness of a sector’s governance framework is a key indicator of performance for sustainable development in the built environment sector. The framework developed in this project has been used to analyse performance in Ghana’s built environment sector and the resulting policy guidance has informed the development of policy and institutional reforms in Ghana.

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CHAPTER 1

Introduction and the Research Questions

CHAPTER 1 contains an introduction and background to the research including a description of the overall scope and expectations for the research outputs.

1.1 Introduction to the Research Project

The rationale for this study is that, in the context of achieving sustainable development in the built environment sector, a framework is needed that provides practitioners with a better understanding of how they and other stakeholders can include environmental, social and economic parameters in their decision making process. The possibility for such a ‘framework of understanding’ has been the concerns of policy makers and industry practitioners (Gilham, 2000 and UNU/IAS, 2002). Indeed, delegates representing built environment policy makers and practitioners at the World Summit for Sustainable Development (GABS, 2002) accentuated the need for a ‘common framework of understanding’ to enhance their ability to make better and more sustainable development choices. The need for such a framework emanates from the increasing complexity of decision making for sustainable development requiring wider understanding of issues, stakeholder requirements and stakeholder priorities as illustrated by Vanegas et al (1996) and requiring decision makers to step out side of their areas of expertise and understanding; Hence the demand for common frameworks for guidance and understanding.

The challenge therefore, is to develop a ‘common framework’ that will enhance the ability of decision makers throughout the built environment sector to develop policies and practices that enable sustainable development to become a reality throughout the sector. The need arises, therefore, to find out if such a framework already exists or if a new framework is needed.

1.2 Priori Theorising

Sustainable Development is the main issue and it is a complex concept. Not only does it include major social, environmental and economic concerns, but there is also a fundamental aspect, which is the ‘process’ of, and ‘capacity’ for, achieving sustainable development. For example, the capacity gaps emphasised by Brundtland (1987) and

further elaborated in Agenda 21 (1992), are latterly presented in the UN Millennium Development Goals (2000) and the Johannesburg Declaration (2002) as the global governance agenda. Thus the study of governance appeared to be a particularly useful area in which to explore either, the existence of a suitable ‘common framework’ or, the development of a ‘common framework’ for use by all built environment stakeholders.

Projects and initiatives that attempt to develop and apply principles of good governance at different levels of government, business and civil society abound. From which two governance agendas emerge:

1. Global governance – dealing with the relationships between, and behaviour of, governmental, non-governmental and intergovernmental organisations; and
2. Corporate governance – dealing with the relationships between, and behaviour of, companies, their directors and critical stakeholders

The literature indicates a governance framework could provide a basis for a ‘common decision making framework’. Whilst governance frameworks are known to differ from organisation to organisation, each is based upon a common set of components and, increasingly, these embrace the wider sustainable development agenda. This is why it can be argued that a governance framework may provide the basis for a ‘common framework’ of understanding as required by decision-makers to enhance and effect more sustainable development.

The built environment sector is also complex. A wide range of ‘sustainable’ solutions are being sought by governments, businesses and civil society stakeholders, yet work on the decision making structures and processes has lagged behind the technical and environmental issues (CIB, 1999). Thus the need to find a ‘common (decision-making) framework’, that is acceptable to all stakeholders and which provides a structure and reason for decisions at different levels of decision making, is overwhelming.

From a different perspective, that of changing from one system of ‘unsustainable’ decision making to a system of ‘sustainable’ decision making, the significance of aiming for a ‘common framework’ has been highlighted by Meadows (1999). In her analysis of changing systems she identified the following 5 most important intervention points as follows:

1. The power to transcend paradigms
2. The mindset or paradigm out of which the system – its goals, structure, rules, delays, parameters - arises
3. The goals of the system
4. The power to add, change, evolve or self organize system structure,
5. The rules of the system such as incentives, punishments, constraints,

It would seem therefore that, according to Meadows (1999), the current decision making system, for sustainable development in the built environment sector, could be most effectively improved by a ‘common’ framework which: enables decision makers to transcend paradigms, or at least objectively accommodate other paradigms; sets out the goals, structure, rules and drivers; and allows stakeholders to organize and adapt the system.

The literature and analysis in this report reveals how Meadow’s picks out attributes that can be identified as key components of governance frameworks, for example goals (purpose) and rules (key drivers). Thus reinforcing the overwhelming significance of a governance framework as a framework in which a common understanding for change and sustainable development can be achieved. The potential of a governance framework as an analytical tool also becomes apparent where the status of different components can be compared and analysed to plan and predict performance.

A quick check with organisations like the International Council for Building Research (CIB) and Royal Institution of Chartered Surveyors Foundation (who, at the time, were thought likely to be at the forefront of governance issues in the built environment), revealed that no other work was proceeding on governance in the built environment

sector. However, there was a newly published report by CIB/UNEP (2002), in which governance was perceived as a necessary component in achieving sustainable construction in developing countries. However, in that report governance was described as a macro-factor outside the influence of stakeholders within the built environment sector. Therefore, it was hardly surprising that until this project there was hardly any literature that served to identify the governance issues affecting the sector. Indeed there was no previous work that aimed to define the governance framework for individual built environment stakeholder groups or the sector as a whole. As the literature has subsequently revealed, important components of a governance framework, such as policies, regulations and capacity, are often addressed in isolation.

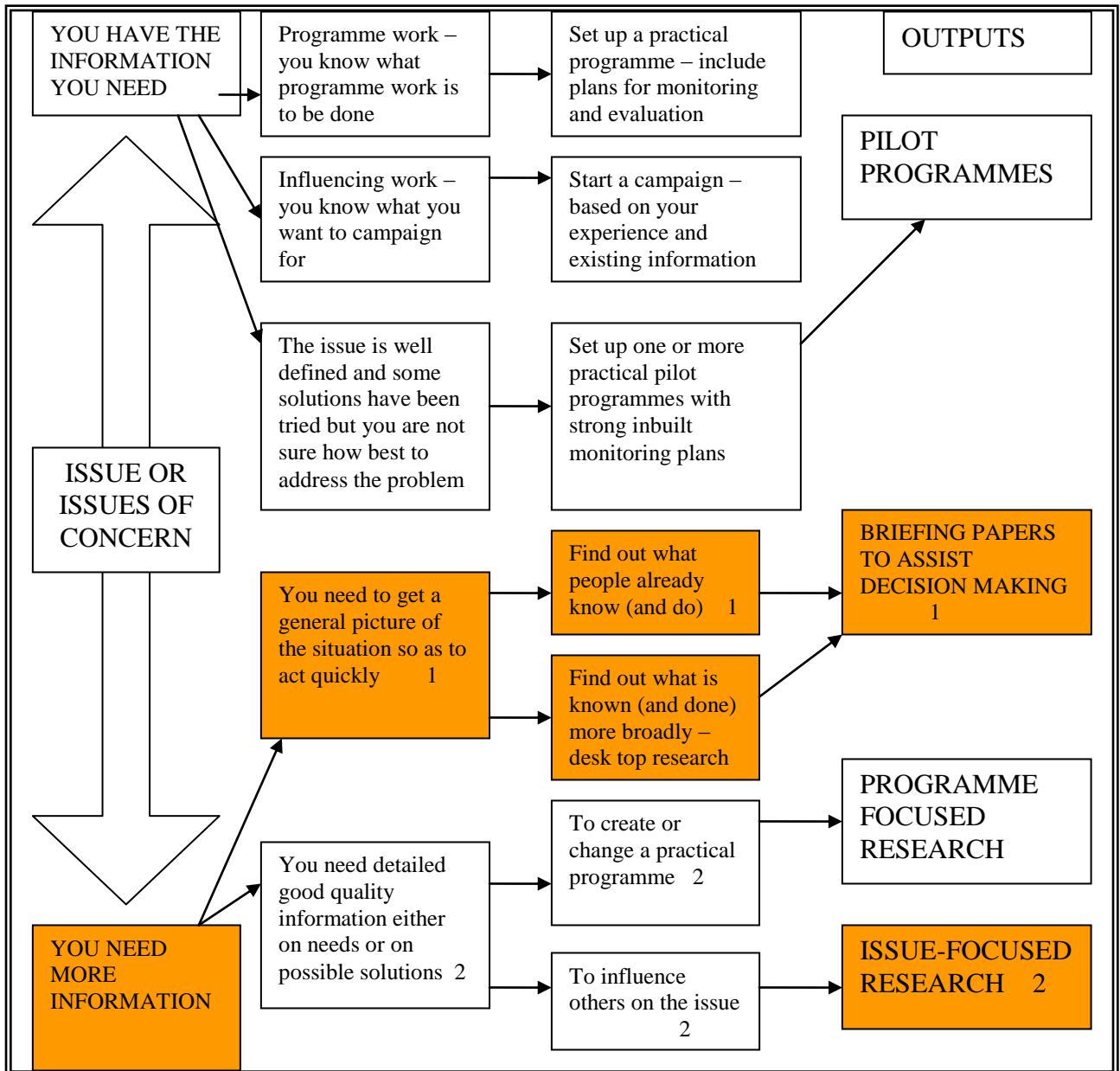
1.3 Scope of Work

The complexity of the issues to be addressed by the research was recognized at the outset. Help was sought, from Figure 1 below, to clarify the scope and type of research to be undertaken; providing an indication of the likely methodology and output. The scope of work is based on preliminary investigations as discussed in priori-theorising section 1.2.

From Figure 1 certain kinds of research have been eliminated. For example, the research is not part of a programme of focused research neither is it concerned with Pilot Programmes. However, it is recognized that more information is needed therefore indicating that the starting point for the research will be the ‘need for more information’ taking one of two routes as follows: (1) aiming to provide ‘briefing papers that could assist decision makers’, and (2) focusing on a specific research issue. Whilst the research is concerned with the issue of governance in the built environment, it is route (1) which appears the most appropriate because it is decision makers who are asking for assistance in making decisions for sustainable development. Therefore, the scope of the research will aim to: (i) get a general picture of the situation (i.e. determine the current state of governance in the built environment); (ii) find out what people already know. (and in this case it is critically important to know what policy makers and practitioners already do as

regards governance in the built environment sector); (ii) find out what is known (and done) more broadly (to ensure global application).

Figure 1: The Scope of Research



Source: Laws et al (2003)

Thus, the need to explore the links between, and relevance of, sustainable development and governance agendas to the built environment was overwhelming whilst ensuring that

policy makers and practitioners remained the main focus for both the research methodology and research outputs.

It has been established that sustainable development is a critical and well established area of knowledge for the built environment sector although socio-cultural issues have largely remained unexplored and there was a declared need for a common decision making framework as stated previously. Furthermore, governance has always been differentiated from Government as a system for decision making and social order (Heywood 2002). However with globalization, and as part of the sustainable development agenda, the growing importance of improved and extended global and corporate governance has emerged as a topic in its own right. Subsequently, through a process of policy formulation, research, and practice, there is considerable pressure on organisations of all kinds to improve their governance performance. And, with the global applicability desired of the output, it was felt necessary to take into account the comparative governance modalities between developed and developing countries.

1.4 The Research Deliverables

From the Priori Theorizing presented in 1.2 above, the Research Aim, Objectives and Outputs were defined as follows:

1.4.1 The Research Aim

To develop a Governance Framework that enables policy makers and practitioners to improve performance for sustainable development in the built environment sector?

1.4.2 The Research Objectives

In order to achieve the overall aim, the research objectives were established, to:

1. Systematically demonstrate that: Governance is an integral component of the sustainable development agenda; The built environment sector is integral to the achievement of sustainable development; Governance is an integral component of performance in the built environment sector
2. Construct a theoretical governance framework for sustainable development in the built environment sector, suitable for developed and developing countries
3. Test the developed framework to ensure its global functionality and relevance to built environment policy makers and practitioners
4. Demonstrate the relevance of a governance framework as a mechanism for effective analysis and decision making to improve performance in the built environment sector for sustainable development.

1.4.3 Anticipated outputs from this research

As determined in 1.2 and 1.3 above, this research was focused on proving the applicability of a governance framework to improve sustainable development in the built environment sectors of developed and developing countries. The following outputs were anticipated:

1. The 'Framework'
2. Evidence which demonstrates its applicability
3. Guidance to assist policy makers and practitioners on its use.

Whilst the outputs were aimed at global applicability it was anticipated that they would be of particular interest to policy makers and practitioners in developing countries, particularly sub-Saharan Africa, where there is a widespread search for improved governance and accountability and where scarce resources must be targeted at the most effective interventions.

It was also anticipated that the project would result in a valuable and unique exploration of the ability of the built environment sector to achieve sustainable development. The

exploration was not intended to be about the technical capacity of the sector but related to its decision making capacity in terms of its governance structures, systems and practices. The aim was to add to the knowledge on decision making and the ability to critically analyse sustainable development performance in the built environment sector in developed and developing countries. It was designed to benefit from both global and local perspectives, focusing on built environment policy makers and practitioners as contributors to, and recipients of, the research.

It was anticipated that if a governance framework was shown to be a relevant framework, in which built environment policy makers and practitioners could work more effectively for sustainable development, then 'governance' also had the potential to be developed as a benchmark and indicator of performance for sustainable development in the built environment sector.

CHAPTER 2

Literature Review and Critical Analysis

CHAPTER 2 contains a review and analysis of the literature to achieve Research Objective 1. It is structured to systematically: Demonstrate that Governance is an integral component of the sustainable development agenda (2.1); Demonstrate that the built environment sector is integral to the achievement of sustainable development (2.2); Demonstrate that Governance is an integral component of performance in the built environment sector (2.3); Identify gaps in the literature that will establish the relevance of the proposed research and draw conclusions to further inform the research methodology (2.4).

2.1 Sustainable Development and Governance

This section explores how the sustainable development and governance agendas have evolved, examining critical documents that demonstrate how policies and practice have been developed and implemented by governments, intergovernmental organizations and corporations in developed and developing countries.

2.1.1 Sustainable Development

The term ‘sustainable development’ was used for the first time at the Cocoyoc declaration on environment and development in the early 1970s (Redclift, 1987). However, the term came to world recognition in the Brundtland Report (WCED, 1987), an inter-governmental report produced for the World Commission on Environment and Development. It is commonly recognized that this report introduced the environmental and ecological concepts to world thinking on development.

However, perhaps more controversially, it challenged the economic models for growth and development by suggesting there were ‘limits’ to growth, and further challenging humanity’s ability to make choices for the future as well as the present by the state of its ‘social organisation’

The extract below captures those three elements:

“Humanity has the ability to make development sustainable – to ensure that it meets the needs of the present without compromising the ability of future generations to meet their own needs. The concept of sustainable development does imply limits – not absolute limits but limitations imposed by the present state of technology and social organisation on environmental resources and by the ability of the biosphere to absorb the effects of human activities”(WCED, 1987)

Limits to Growth (Meadows et al, 1972) was a significant report commissioned by the Club of Rome to address the 'limits' component subsequently identified in the Brundtland report, 15 years later. This report investigated the long-term consequences of existing patterns of consumption and production exemplified by population growth, industrial capacity, food production, and pollution (Meadows et al, 1972). It predicted that if current trends of population growth, industrialization and resource depletion went unchecked, the world would face very real physical limits to growth created by shortages of resources and the breakdown of environmental systems. The argument was that changing the insatiable demands on the biophysical environment is the most viable and sustainable way of preserving global prosperity and maintaining the integrity of the global biophysical environment. The 1973 Arab oil embargo and subsequent energy crisis that propelled the world economy into recession was a case in point.

From the energy orientation of the 1970's to the broader environmental orientation of the 1980's, the 1990's have seen the introduction of the Sustainable Development agenda which includes the three interrelated though not clearly defined areas of concern, namely: environment, economics and society. As Adebayo (2002) observes, economists call for 'sustainable economy', agriculturalists call for 'sustainable harvest' and sociologists call for sustainable societies. Redclift (1987) demonstrated that fundamental questions like 'what is sustainable development?' depend on which type of model is used to measure development as well as the prevalent different perspectives and realities such as those of developed and developing world situations.

These differences were most evident when comparing existing economic models of growth and development which failed to value the environment (Coker et al: 1992). In fact Holland et al, in Coker et al (1992) goes on to discuss the problems of valuing the environment in relation to the Pearcean philosophy of value (Pearce et al 1989) which reflects people's preferences and therefore frames the value of the environment purely in human terms, thus, valuing the environment for its own sake. Johansson (1993) went further to explore the cost benefit analysis of environmental change by exploring various

methods for valuing and accommodating public goods, health and intergenerational concerns.

Hawken et al (1999), argues the case that natural resources should be considered ‘capital’ in the same way that financial capital and human capital are valued components of production such as Cobb and Douglas (1928) in CEPA (2005), where land, labour, and capital are functions of production. Thus, Land in this sense is taken to denote natural resources. The term ‘Natural Capitalism’ came from this way of thinking. Hawken et al (1999) puts across a forceful case for Natural capitalism, as an alternative paradigm to traditional economic models. As they pointed out, the world has advanced since the days of Adam Smith (1776) when shortages of resources or their impact on the natural environment were not contemplated. At that time, the only possible limit to growth was perceived to be the labour constraint. This seems inappropriate to nowadays where highly industrialized nations suffer serious shortages of resources and, in the case of developing countries, labour remains cheap and plentiful..

Reinforcing the point made by Redclift (1987) that people have different perspectives on sustainable development, Hawken et al (1999) also provide examples of how different groups, such as fishermen, industrialists and peasant farmers approach the exploitation of natural resources. One example is where a peasant fisherman uses explosives to harvest and sell fish and coral, as is often practised in Ghana. Demonstrating how, in a situation where some people might imagine a more symbiotic relationship between man and nature, the need for income overrides long standing traditions and the long-term well being of the environment. The example of the fisherman, demonstrates how socio-cultural issues affect human behaviour and it illustrates a stark difference in the needs and expectations of rich and poor people especially in the differences between developed and developing countries. The differences can be addressed in some part through cultural analysis such as that pioneered by Hofstede (1991). In Hofstede’s terms, this example provides an interesting conflict of interest between short and long term perspective and individual and collective perspective. That is prioritizing short term personal gain over

the long-term collective benefit in maintaining the environment and these can also be explained by others such as Maslow (1987) in his hierarchy of needs.

Meanwhile, as a result of the new environmental parameters being introduced into the decision making equation, economists like Johannson (1993) and environmentalists like Coker et al (1992) turned their attention to developing cost models that attempted to combine the economic and environmental agendas. This work was further advanced by Pearce et al (1989) and Hawken (1994) who explored the many interactions between the economic and environmental agenda, whilst Johnston (1996) added the political and economic dimension to environmentalism.

However, as Mawhinney (2002) noted, most often environmentalists battled against economists, and the social agenda appeared to be sidelined. Approaches ranged from the pluralist approach of economists such as Norgaard (1985), to the deep ecologists such as Tobias (1994) with his emphasis on a ‘metaphysical’ approach. Mawhinney (2002) brings in socio-cultural and process issues such as value judgements and democracy which he calls the ‘*missing elements in the debate*’. Evidence from the numerous commentators on how sustainable development can be defined or should be approached indicates a complex and poorly understood decision making environment (Mawhinney, 2002).

And it was Brundtland (WCED, 1987) who identified the limits that existed in decision making capacity. This has subsequently become the socio-cultural agenda for sustainable development which comprises the gaps at local and global levels in regards to the ability of decision makers to integrate social, environmental and economic concerns into decision making process. It is particularly important in relation to the governance agenda as the limits in ‘social organisation’, mentioned by Brundtland, cross over with the jurisdictional, participatory and incentives gaps identified by UNDP (1999).

Whilst progress was slow as far as the ‘social organisation’ aspect of Brundtland’s agenda was concerned, on environmental issues the Brundtland report galvanised world

opinion into action through a series of summits and conferences such as the Rio Summit (UN, 1992), Kyoto (UN, 1995) and COP3 (UN, 1997). At the Rio Summit, the Agenda 21(UN, 1992) initiative was adopted which was billed as a ‘global partnership for sustainable development’. It sets out a wide ranging agenda covering 38 ‘Agenda 21 Issues’. It said:

“...integration of environment and development concerns and greater attention to them will lead to the fulfillment of basic needs, improving living standards for all, better protected and managed eco systems and a safer, more prosperous future. No nation can achieve this on its own; but together we can” (global partnership for sustainable development, 2002)

Agenda 21 sets out a comprehensive agenda of goals and actions in 4 sections:

- Section I Social and economic dimensions
- Section II Conservation and management of resources for development
- Section III Strengthening the role of major groups (which are in this case the same as the Major Groups referred to in the multi-stakeholder consultation for WSSD)
- Section IV Means of implementation

Not only does Agenda 21 provide descriptions of the UN’s social, economic and environmental aspirations but it also provides a more comprehensive definition of what Brundtland (WCED, 1987) meant by ‘limits on social organisation.’, sections I and III particularly recognise the need for substantial institutional reform throughout all sectors including intergovernmental institutions.

Another important factor that emerges in Agenda 21 is the concept that sustainable development is defined as a process rather than a defined set of conditions or ‘end point’

(du Plessis, 2002) For example, sustainable development is defined as *‘a process of implementation through a new global partnership’*. There are several implications for us to consider from this perspective:

- A process needs a set of rules and principles such as a ‘governance framework’
- The process will evolve as end users needs and competencies evolve
- We cannot rely on prescribed outcomes to be sustainable in different situations (ie there is not a ‘one size fits all’ solution for SD)

In conclusion, the concept of sustainable development is rather a process than a ‘means to an end’ in which decision makers balance economic, environmental and social factors for present and future needs. Whilst there has been strong focus on the conflicts between environmental and economic priorities, there are now numerous international initiatives addressing some of the major environmental concerns such as climate change, CO₂ reduction, biodiversity, water and energy efficiency. There is no doubt also, from the discussion so far, that decision making is a critical component and that institutional capacity (in governments, private sector and civil society) is widely acknowledged as the ‘social organisation’ (WCED 1987) upon which the whole strategy of sustainable development crucially depends.

It should be noted that, given the discussion and debate on the full definitions and implications of sustainable development, no attempt is made to ‘reinvent the wheel’. However, an attempt has been made to synthesise and adapt the concept in the contents of the governance framework (CHAPTER 4).

2.1.2 Global Governance

Emerging from the Commission on Global Governance (CGG, 1995), an independent group of 28 world leaders proposed a ‘global civic ethic’ based on seven core values: respect for life; liberty; justice; equity; mutual respect; caring; and integrity. At the same time, UNDP (1999) commenced a project that went on to identify 3 gaps in the system of international cooperation for dealing with, those things it described as, public goods. The gaps identified include:

- A jurisdictional gap, where responsibility lies beyond the state boundaries
- A participation gap, in which civil society or even less powerful countries are excluded from global management systems
- An incentive gap, insofar as there are few, if any, incentives for government or others to coordinate action for resource management.

On the one hand, the governance agenda is being driven by intergovernmental organisations such as the United Nations, UN-Habitat and World Bank and, on the other hand, by international non-governmental organisations representing civil society, environmental and business stakeholder groups. Global governance initiatives tend to fit into one of 3 broad categories:

- Issues associated with sustainable development such as managing environmental ‘limits’ indicated in the Brundtland report
- Rights based governance issues such as human rights of access, treatment, outcome, etc
- The institutional and structural gaps identified by UNDP (which correspond very closely with the principles set out in Agenda 21 (1992) Sections III aimed at strengthening the role of major groups and Section IV which focuses on the means of implementation – ed).

There are several examples of international non-governmental organisations who have tackled different aspects of global governance such as CIVICUS (Naidoo, 2003), Amnesty International, UNED Forum (SFOCF, 2002), and World Humanity Action Trust (WHAT, 2002).

The World Humanity Action Trust is a good example of how international non-governmental organisations (INGOs) have influenced the global governance agenda on issues associated with Sustainable Development. Formed in 1993, immediately after the Rio summit, WHAT pursued a ‘global agenda for governance’, on the basis that world

security was at risk from the cumulative threats of population growth, trade in illicit drugs, pollution and climate change, globalization of markets and increasing pressure on resources generally. Their final report (WHAT, 2002) defined governance as *'the framework of social and economic systems and legal and political structures through which humanity manages itself'*. Through three commission reports, WHAT identified that governance was a fundamental component for sustainable development. Particularly it was noted that globalisation demanded better global governance measures to facilitate vertical and horizontal integration of policies and objectives in decision making structures (WHAT: 2002). By using the USSR as an example of how top down planning and control offers no guarantees of environmental protection, WHAT argued that governance requires not only good regulation but a look at market based solutions for an effective global governance of biophysical resources.

Amnesty International, as an INGO, focuses on protecting the human rights of oppressed people. It offers not only practical support for those wrongly persecuted but also acts as a platform on which injustices can be made more transparent and as a lobby and advocacy organisation influencing governments and intergovernmental organisations.

UNDP (1999) identified jurisdictional and institutional gaps in the global governance framework. The Global Environmental Facility (GEF) is one example of an organisation that is filling the institutional gap for global environmental management and the World Court, which was formerly the International Court of Justice, is an example of an institution filling the jurisdictional gap although with limited powers and recognition.

Intergovernmental monetary organisations such as the World Bank (WB) and International Monetary Fund (IMF) are institutions that have played an important role in global governance and development for many years. This is particularly the case when considering the relationships between developed and developing countries because these institutions apply developed country governance conditions to recipient countries which are largely developing countries. The WB and IMF were set up after a meeting of 43 countries in Bretton Woods, New Hampshire, USA in July 1944. Their aims were to

rebuild the shattered post war economy and to promote international economic cooperation. They were based on the ideas of a trio of key experts – US treasury secretary Henry Morgenthau, his chief economic advisor Harry Dexter White, and British economist John Maynard Keynes. They wanted to establish a postwar economic order based on notions of consensual decision-making and cooperation in the realm of trade and economic relations. It was felt by leaders of the allied countries, particularly the US and Britain, that a multilateral framework was needed to overcome the destabilising effects of the previous global economic depression and trade battles. (interesting to note the need for a ‘multilateral framework’ akin to the ‘common framework’ sought in this project)

However, Woods et al (2001) provide a useful insight into the expansion of the role of these institutions and particularly how they have become influential in setting standards for national governance where they prescribe structures and institutions for recipient countries which are mainly developing countries. Woods et al (2001) propose that, whilst originally restricted in their influence by Article 2 of the Charter of the United Nations, the powerful industrialised members of the IMF and the World Bank have realigned the role of IMF institutions to *‘forceful, and far reaching structural reforms’*. This is seen as essential to the economies of all members in order to correct weaknesses in domestic financial systems and ensure growth and poverty alleviation. Structural reforms are certainly evident in the conditionality for loans and subsequently debt relief to developing countries.

The influence of these institutions is confirmed by Collingwood et al (2002) who says that:

- *The World Bank’s ‘good governance’ agenda is concerned with the relationship between the state, the market, and civil society in loan-receiving countries. The ideal of the ‘minimalist state’ has been replaced with that of the ‘effective state’.*
- *‘The Bank argues that in order to be effective, the state must play a critical role in managing and regulating the market and civil society’*

- *'The relationship between the state and the market lies at the heart of the World Bank's good governance agenda and the Bank has undertaken many reforms in this area'.*

The impact this has on developing countries is made clear: *"As they extended loans to indebted developing countries, so too they required countries to meet specific conditions. At first these conditions focused on macro-economic indicators (in the case of the IMF) and specific sectoral reforms (in the case of the World Bank). In the ensuing two decades, however, the conditionality of both institutions has broadened and deepened dramatically, delving into areas which were previously inconceivable such as good governance, the rule of law, judicial reform, corruption, corporate governance."* (Woods, 2001)

The issues discussed above are important issues for this study. They demonstrate the need for a better understanding of the values and culture that drive organisations and particularly how the values and culture of a few powerful stakeholders can influence others.

Recognising that the IMF and World Bank were set up on the basis of ideas that predominantly emanated from the values of two countries and particularly three economists, boundaries of authority and influence of these governance institutions are important factors of concern. In regard to scoping our governance framework, Woods et al (2000) contest that intergovernmental organisations have gone beyond originally defined boundaries of influence and authority.

Thus, there must be a legitimate question about who governs and monitors intergovernmental organisations. Indeed, Simai (1994) argues that:

'The key issue of governance in all IGOs is the quality and relevance of the outcomes of their work for the member states individually and for the international community as a whole.' (Simai, 1994)

He prescribes a partnership between the intergovernmental organisations and the governments of nation states with mutually agreed criteria for success. What is clear is that developing countries have had less influence on the international monetary organisations than developed countries in setting the ‘mutually agreed criteria.’ This is an issue of concern, especially where *voting power on the World Bank's board is based on the members' capital subscriptions which means the members with the greatest financial contributions have the greatest say in the Bank's decision-making process. The US government holds 20 percent of the vote and is represented by a single Executive Director. The 47 sub-Saharan African countries, in contrast, have two Executive Directors and hold only seven percent of votes between them.*

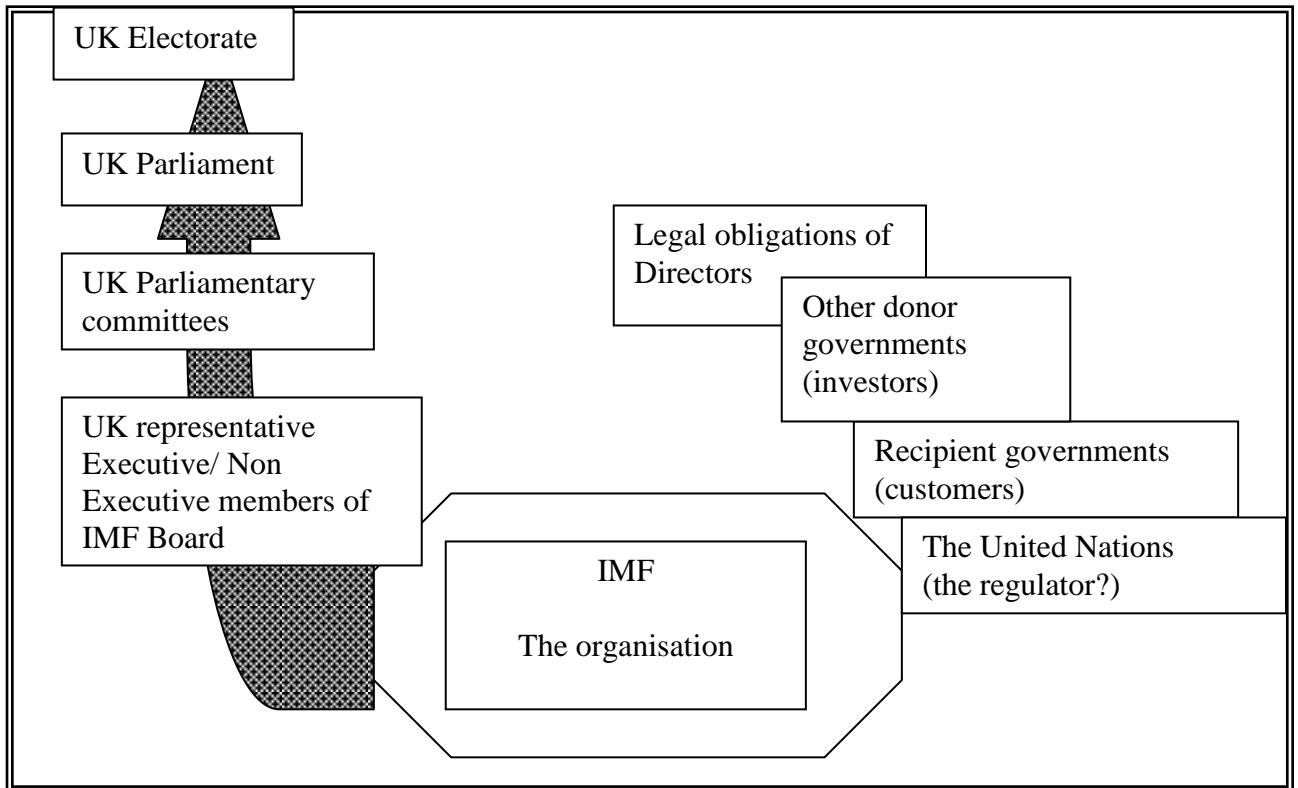
The distribution of voting rights along these lines suggests that the internal power base is in favour of the developed countries, which whilst that may seem reasonable in regard to those who invest financially in the organisation, this may not be appropriate where a wider stakeholder perspective is expected.

One example of how the IMF is monitored by the United Kingdom, as a member state, is given in the 4th Report of the UK Parliamentary Committee on The IMF (2000). The emphasis of this reporting committee is on holding the UK appointed directors of the IMF to account in relation to the impact of IMF policy on the United Kingdom. Whilst this is not the balance that CIVICUS and others might prescribe in favour of developing countries, it is nevertheless an example of a broader governance framework in which intergovernmental organisations can be held to account.

Figure 2 illustrates the accounting chain from IMF to UK electorate along with other key stakeholder groups within the IMF's governance framework. It could be considered ideal to have such accounting chains to the electorate of each donor and recipient nation state. The UK's Parliamentary committee (2000) make the point that: “ *the IMF is now putting a much greater emphasis on standards of accountability when putting together programmes for governments around the world. Therefore, if the IMF is to retain*

credibility, it must ensure that it is itself subject to the same standards of accountability that it expects of its "customers".

Figure 2: IMF's Accountability Framework for the UK



Sadly, no such equivalent has been identified so far for a developing country suggesting therefore that developing countries have far less, if any, influence on the governance of the IMF. Whilst Woods et al (2001) points out that, by being involved in a wide ranging domain of advice and conditionality, the World Bank opens itself up to a wider range of policies, people and stakeholder groups in the countries it influences, the influence of such countries will be dependent on the political will and capacity of stakeholder institutions to respond. Where those stakeholder institutions have the resources and capacity to challenge the World Bank's performance, the result will be more effective scrutiny.

It is also interesting to see how the World Bank, as an intergovernmental institution, plays many roles in both global and corporate governance agendas. Not only is it an instigator of institutional reform in developing countries (Global Governance) it is also a promoter of improved corporate governance practices (Corporate Governance) throughout the world and, as an organisation in its own right is subject to increased scrutiny from different stakeholder groups.

In conclusion we can see that the Global governance agenda concerns itself with standards, principles, rules, and behaviour. Its primary institutions are governments and intergovernmental organisations. Whilst the agenda has been developed at governmental and intergovernmental level, the implementation cascades down through national governmental structures to impact on national and local laws and institutions. There remain questions about who sets and maintains standards amongst the institutions, especially given the notable differences in the influence weighed by developed and developing countries.

2.1.3 Public Sector Reform

As was evident above, public sector reforms are an integral part of structural reforms designed to bring about better governance. There are questions regarding the type of reform taking place, the drivers and the impact it has on the public sectors in question.

As policies and directives emanate from intergovernmental organisations, they cascade down to national governments and their civil servants. The Global Governance Agenda is largely put into practice in the public sectors of Nation states which have been the subject of public sector reform programmes for over 30 years.

Initially, inspired by demands from intergovernmental monetary organisations for tighter fiscal control, the reforms have gone through various cycles generally aimed at reducing the size of the civil service and therefore cost of central government. Similar reforms are now being enacted in what are predominantly developing countries.

A report from OECD (2003) provides an indication of the current state of reforms required on governments throughout the world and documents published in Ghana (ROG, 2003 and 2004) demonstrate how these reforms are enacted by Governments. Evidently, governments face new pressures that require quite fundamental systemic adaptations, especially with regard to public sector reforms where concern for efficiency is being supplanted by problems of governance, strategy, risk management, adaptation, collaborative action and the need to understand the impact of policies on society. This statement reflects the observations made by Collingwood et al (2001) and Woods et al (2001)

Being more precise, the OECD (2003) Report sets out 4 requirements for public sectors to achieve and these include:

- *'Better diagnostic and risk analysis tools (recognizing the important differences between one governmental situation and another)'*
- *'Deeper understanding of civil service culture and leadership and its critical place in good governance'*
- *'More empirical research and data on behavioural and attitudinal change (recognising the prevalence of empty rhetoric and superficial action in this area)'*
- *'Improved intervention and change strategies – which recognize both the difficulty of achieving sustained behavioural change, and the fact it must proceed in a managed sequence'*

These requirements pose special problems for public sectors in developing countries. A recent report by Center for Democratic Development (CDD, 2004) provides useful illustrations of the points made by OECD and reinforces the problems these requirements pose to ministries, government departments and sub-vented agencies in a typical developing country such as Ghana. The report further identifies lack of resources, low skills levels and the lack of modern systems of management and administration as major barriers to reform. Similarly, the report also identified a distinct 'perception gap' about

the state of public sector reform in Ghana which has been taking place for over 20 years. In fact, there is considerable negativity towards future reforms because previous attempts have not reflected or considered existing civil service cultures, have ignored existing practices, and excluded the majority of staff from the process of consultation and engagement. Holland, et al (2003) support the case made by CDD that for public sector reform to succeed in Ghana, and move 'beyond the point of rhetoric' it must be informed by an understanding of the policy, governance and institutional arrangements already in place and the potential for change. There is a need for more inclusive processes to inform, consult and engage existing staff as well as consistent political support for the process of reform and more openness by government officials.

As this study aims to validate its output in regard to local conditions, it may identify critical issues for public sector stakeholders in the built environment sector and provide guidance on future reforms for better governance. In the previous section on sustainable development, it was identified that sustainable development is a continuous process of improvement. This theme of change and improvement, as a factor of improving governance was also identified in the recent reports on public sector reform in Ghana (CDD, 2004). Therefore, the governance framework to be developed for this study must be able to accommodate the dynamics of change, particularly as decision-making skills and competencies evolve and needs change in the user groups.

2.1.4 Corporate Governance

The corporate governance agenda is a critical source of guidance for this research. For the purposes of this investigation, it is important to look at how the corporate governance agenda has developed and is now crossing over and combining with the intergovernmental agenda for sustainable development and national and institutional governance.

According to Bondzi-Simpson (1998) the antecedent of the modern business or company developed in Europe during medieval times when guilds were established to preserve the

monopoly of particular trades and regulate members in carrying out their trade. During the 17th century, the joint stock company emerged where members contributed merchandise (ie stock) and the company carried on trade on all of its member's behalf.

The principles of corporate governance emerged from the industrial revolution in the United Kingdom during the 19th Century with the advent of the Act for the Registration, Incorporation and Regulation of Joint Stock Companies in 1844. As companies grew larger there was a need to recognise them as separate entities in law and to separate the duties of those who owned the companies from those who managed them. With the emergence and subsequent excessive concentration of power in the hands of professional managers, corporate governance has subsequently concerned itself with managing the interests of individual directors in relation to the company.

CACG (1999) said that that corporate governance was '*essentially about leadership*'. They cited leadership for efficiency; for probity; with responsibility; which is transparent; and which is accountable. In their guidelines for board selection, CACG (2004) went on to describe how the roles and responsibilities of governance boards should be clearly defined, relationships and the values and rules governing their behaviour should be formally recorded. Bearing in mind the broad scope of the modern corporate governance agenda (Gilham, 2004a) described corporate governance as:

"a set of principles to govern the roles and responsibilities of the company and its board as well as governing the relationships between: The directors and the company; and The company and its relevant stakeholders"

As is evident from corporate governance guidance material such as that produced by the International Federation of Red Cross and Red Crescent Societies (IFRC 2000) and the Canadian Panel on Accountability and Governance in the Voluntary Sector (PAGVS, 1999), 'corporate governance' is a concern for any organisation established as a separate legal entity whether it be in the private or not-for-profit sector.

King (2002) points out that Directors are accountable in law to the company and responsible to stakeholders for the performance of their organisation. This provides two powerful but distinctly different mechanisms for compliance – one is through legal compliance of individuals to pre-stated requirements and the other is through the pressure of stakeholder groups to work to a mutually agreed set of standards. It means that if social, environmental and economic factors are declared in the governance framework at the outset, then both mechanisms can be used to ensure compliance throughout the organisation's activities.

Existing corporate governance principles, underpinned by company law provide therefore, a mechanism for both legal and voluntary action. This theoretically strong position needs to be balanced however with the reality in many developing countries. For example, the Companies Code in Ghana (1963) is not clear on the role of Directors and in fact suggests that Directors are accountable to the Shareholders who elected them onto the Board. This latter conclusion is contrary to modern best practice and the need for reform has already been recognized in Ghana (Prempeh, 2002).

The balance between legal and voluntary standards for both governance and sustainable development has been advocated by many institutions. For example, Iskander et al,(1999), in an overview of corporate governance on behalf of the World Bank, argues that implementation of corporate governance requires a partnership between government and the private sector. In particular, successful implementation of corporate governance needs to be “....*adapted to the corporate structure and the implementation capacity of public and private sector*” (Iskander et al, 1999). Indeed, it has been argued that “*what is needed is a combination of statutory regulation and self-regulation. The mix will vary around the world, but nowhere can statutory regulation alone promote effective governance.*’ (Sir Adrian Cadbury, in Iskander et al 1999)

There are some good examples of the type of partnerships needed between public and private sector organisations. For example, national environmental agencies such as the Environmental Protection Agency (EPA) (2004) in the USA and the Environment

Agency (EA) (2004) in the UK have comprehensive approaches of working in partnership with companies to encourage higher voluntary standards. In the USA, this also includes links with compliance assistance initiatives such as the Construction Industry Compliance Assistance Center (CICAC) (2004) which gives advice to a wide range of industry sectors, including construction, on how they can comply more effectively with regulation.

As advocated by the World Bank (WB), EPA and EA above, a partnership approach also requires a pro-active approach to corporate governance from organisations themselves. The concept that organisations act in different ways due to their corporate culture has already been introduced into the construction sector by Gilham (1998a and b) and Bourdeau et al (1998). It means that there will be some organisations with a naturally defensive and regulation-driven approach, whilst others will be able to engage pro-actively and others will aim for comprehensive voluntary standards with many of their stakeholders.

This leads us to the conclusion that certain corporate cultures are more conducive to implementing measures for good corporate governance and sustainable development. A mapping of organizational cultures in the built environment sector would be a useful exercise to indicate how well equipped sectors within the built environment are to respond to the corporate governance and sustainable development agendas. This falls outside the scope of this project.

The balance between compliance and voluntary action has been documented in milestone reports on corporate governance at a national level (King, 2002; Turnbull, 1999). Within the corporate governance domain, these reports are accepted as setting new standards of corporate governance and in each case support practical implementation by attention to national legal and cultural conditions. In the case of King (2002), his approach has led to new legislation being introduced by government, since the publication of the first report in 1994. This is an interesting example of how voluntary action has led regulation. This has set even higher voluntary standards to which it encourages South African

Corporations to aspire. We can see later in this section how reports like these are extending the corporate governance agenda to include broader social and environmental concerns.

Evidence would suggest therefore that a Governance Framework will need to include both voluntary and compliance issues thus enabling corporations with different cultures to be included. The basic rules for corporate governance are well established. There appears to be a consensus emerging, at least in the literature from countries with developed economies, on corporate governance which is expressed as a set of common principles. The requirement is for partnerships between government and the private sector and a balanced approach between regulation and voluntary action. We should however, pause to recognize that these preferred options are, in themselves, culturally dependent. They have been developed to regulate the actions of corporations as they are expected to behave in certain societies. The corporate governance agenda emerged in the UK and has evolved primarily to regulate private corporations in the highly industrialized nations. Most of the nations also have highly developed governments with market and regulatory based mechanisms for enforcing governance standards. However, we can see that difference exist between corporate governance structures in the UK and France, prompting the question: should corporations in developing countries be subject to the same corporate governance requirements as those in developed countries?

Hofstede (2002) provides useful examples of how cultural dimensions can affect the type of relationships between, for example, governments and companies in different countries. Hofstede breaks his analysis into 5 cultural dimensions which can be used to measure the preference of cultural groups such as organisations, governments and nations for: (i) different governmental and organizational structures; (ii) partnerships or individual actions; (iii) conflict or cooperation; (iv) innovation or regulation; and (v) short or long term outcomes.

As has been established by King (2002) Governance standards need to be relevant to the society in which they are to be applied. It is therefore very important to check assertions

such as the ‘Principles of Corporate Governance’ espoused by OECD (2004), CACG (1999 and 2004) for their validity in different cultures and societies. The validation process planned for this project will help cancel out such influences on the final output.

2.1.5 The Merging Governance and Sustainable Development Agendas

The overall conclusion from the preceding section is that global and corporate governance agendas have converged with the sustainable development agenda. This convergence is further explored below from both the global and corporate perspectives.

From the Global Governance perspective: From Brundtland (WCED, 1987) and the Commission on Global Governance (CGG, 1995) it has been a consistent process of integration. In fact, looking back at Agenda 21 (UNSD, 1992 and 2002) we can see that, what might be called, ‘institutional’ and ‘structural’ issues, were being set out in the sustainable development agenda from the outset. And, by the turn of the millennium there was significant evidence to demonstrate how the agendas had indeed merged at intergovernmental level. First of all, the UN Millennium Declaration (UN, 2000) set out 8 headline ‘Millennium goals’ and a UN Road Map (UN, 2001) confirmed how the millennium development goals were based on different UN agreements and brought together under the sustainable development and governance agendas.

The Millennium goals are important for three main reasons: First, the 8 Millennium Goals define a de facto ‘Development’ agenda for the United Nations. In practical terms these headline goals define what sustainable development is going to be at the intergovernmental level as the majority of resources are being focused on achieving them; Second, as the United Nations is funded by Nation States, investments by national governments will predominantly aim to satisfy these goals. This is already happening as exemplified by the UK Governments policy aimed at targeting aid to developing countries: “*The central focus of Government’s policy, based on the 1997 and 2000 White Papers on International Development, is a commitment to the internationally agreed Millennium Development Goals...*”(DFID, 2001) and in developing countries for

example, as stated objectives in Ghana's Poverty Reduction Strategy (ROG, 2003a) and its annual budget statements (ROG, 2005b); Thirdly, loans made by intergovernmental monetary institutions, such as the World Bank, for national development projects addressing the Millennium goals have institutional reform 'strings' attached which aim to encourage recipient States to implement global governance standards.

In particular, the last point raises important issues that demonstrate the connection between global governance and sustainable development: First, through intergovernmental bodies such as the IMF and World Bank governance standards which largely reflect the political systems and governance standards of Europe and North America (that is the 'Donor' countries), are being applied in recipient countries. Second, results from a major United Nations University study (UNU/IAS, 2002), indicate a direct link between sustainable development and governance stating the importance of governance institutions; stakeholder relationships; multi-lateral agreements; relationships between policies and agreements; and a common understanding for all stakeholders; Third, and perhaps most conclusively, The Johannesburg Declaration (WSSD, 2002) illustrates this perfectly that:

"We agree that there is a need for private sector corporations to enforce corporate accountability, which should take place within a transparent and stable regulatory environment" (WSSD, 2002)

"We undertake to strengthen and improve governance at all levels for the effective implementation of Agenda 21, The Millennium development goals and the Plan of implementation of the Summit" (WSSD, 2002)

From the Corporate governance perspective: The corporate governance agenda has also become a global concern. Corporations have always had to apply some form of corporate governance in their national operating environment. With increasing globalization, both in business itself and through the activities of intergovernmental organisations like the World Bank and NGOs like Friends of the Earth, previously

accepted standards of corporate governance are exposed as inadequate to cover the diverse operating conditions experienced in different countries. Perhaps more importantly, and certainly more of a challenge, is the need to manage relationships between an organisation and an increasingly diverse range of stakeholder groups.

The Organisation for Economic Co-operation and Development/World Bank (OECD, 2002 and 2004) and the Commonwealth Association for Corporate Governance (CACG, 1999) have produced guidance documents on the subject. In fact, as identified by Adei et al (2003) there is a wealth of information and guidance material available that aims to encourage companies to improve their governance performance and broaden their corporate governance agenda.

Iskander et al (1999) in a World Bank publication, pointed to the growing acceptance of the “basic principles for corporate governance” which they list as: Transparency, Accountability, Fairness and Responsibility. Whilst on the one hand, it recognizes basic principles it also acknowledges differences in company structures that exist around the world and how, for example, the dominance of family owned and state owned enterprises in developing countries will need special attention.

The Corporate Social Responsibility (CSR) agenda has provided one framework on which companies have broadened their accountability and reporting base to more diverse stakeholder groups. As reported by groups such as Business for social responsibility (2003) and the CSR Round Table in Europe, (CSR, ESF, 2002) there are many practical examples of firms expanding their reporting agenda under the CSR banner.

In the UK, the corporate accountability agenda has consistently been taken further by organisations such as the Prince of Wales Business Leaders Forum (PoWBLF, 1996, 1998 and 2002). These three notable publications, developed in collaboration with intergovernmental organisations like UNDP, World Bank and International Alert have set out a rigorous agenda for business to take pro-active measures for world issues such as Peace and Partnerships for Development. The CSR prescription for businesses includes:

Corporate contributions to development; Partnerships with international NGOs, international agencies and businesses; Prevention strategies, crisis management and post conflict strategies for Peace; Policy dialogue; Social investments; Future business developments and profitable performance; Business multipliers with communities; Community relationships; Learning Partnerships; Leadership.

CSR has become a much debated and particularly complex agenda. There are also examples of governments responding strongly to the CSR agenda, for example the UK government appointed a Minister for Corporate Social Responsibility and the International Standard Organisation announced in June 2004 that it would go ahead with an International Standard for Social Responsibility. However, with few exceptions, the CSR agenda is promoted by non-governmental groups rather than the much needed business centered approach as advocated recently by Julia Claverton (2004), Chief Executive of the UK's Business in The Community (BITC). Speaking at the World Council for Corporate Governance (WCFCG 2004) she argued that corporate governance is about corporate responsibility. This view holds that the 'social' angle confuses and detracts from the fundamental legal and fiduciary responsibilities that corporations have to their main stakeholder groups.

Altham (2003) argues a similar case as Claverton (2004). She says that CSR is not enough because CSR has focused on the outward looking aspects of a company's relations with its stakeholders. She advocates an approach which she calls Business Ethics to provide an inward looking approach that helps manage risks to the corporation. Therefore, Altham (2003) supports the suggestion by Claverton (2004) for an approach that focuses more on individual corporations. The critique of CSR by both Claverton and Altham supports the case for a more fundamental set of principles that can be applied readily to individual organisations, and possibly to individual directors, to satisfy their legal and fiduciary responsibilities.

Whilst CSR has seemingly been embraced by the corporate world, Sustainable Development has been addressed with less certainty. As Stigson (1996) confirms that the

debate on sustainable development and business has been polarized between environmentalists and economists. This is further compounded by the uncertainty surrounding the likely impact on business, and this had hindered rapid adoption of sustainable development by Business. Indeed, Stigson (1996) acknowledged that many corporate responsibility initiatives sat at a distance from the company's core business and was disengaged from their long-term strategy.

However, the corporate agenda for sustainable development has been developed and represented at the global level by the World Business Council for Sustainable Development (WBCSD). From inception, the WBCSD took a strong line on environmental issues describing industry's contribution to sustainable development as eco-efficient leadership. Stigson (1996) goes on to advocate that effective eco-efficiency is dependent on more than environmental management systems operating in an organisation. He says that its effectiveness is dependent on how its leaders interact with external institutions, respond to legislation and stakeholder groups. It is in this description that we can also see cross-overs between the principles of corporate governance for better relationships and standards set by legislation and stakeholder groups.

To further illustrate this point, the WBCSD (2003) have developed projects in governance, accountability and reporting, capacity building and financial sector activities, as well as its more traditional environmental themes. Also, cross-cutting themes such as Corporate Social Responsibility and Risk have been introduced. As accountability and reporting have become central issues for the WBCSD, international initiatives on corporate reporting for sustainable development are also emerging.

The most advanced and seemingly comprehensive corporate reporting structure for sustainable development is the Global Reporting Initiative (GRI, 2002). This has been developed by a consortium of corporations and NGOs and it continues to evolve in complexity and scope. ACCA (2004) reported over 500 corporations were piloting the scheme in 2004 and the GRI web site (2009) reports over 1500 corporations submitting voluntary reports. Just as the UN Millennium Development Goals have created a de

facto standard for sustainable development at intergovernmental level, so too has the GRI created a de-facto standard for corporate sustainability reporting at the business level, as a core requirement for corporate governance.

GRI is an important point of reference for this study because, although conceived as a means of improving and standardising corporate sustainability reporting, it places 'sustainability reporting' firmly in the governance agenda for corporations and therefore, a central issue for this investigation. For example it says:

“[GRI] provides an overview of the governance structure, overarching policies, and management systems in place to implement the reporting organisation’s vision for sustainable development and to manage its performance.” (GRI, 2002)

As already indicated, global and corporate governance agendas merge with the sustainable development agenda at intergovernmental level, brought about in the Johannesburg Declaration (2002). This is illustrated by the WBCSD (2003) that:

“Fueled by the scandals on Wall Street and the Johannesburg process, 2002 saw a continued drive for more accountability, transparency, and reporting on progress. Major stakeholder groups – shareholders, employees, and NGOs – are calling for more disclosure on a wider range of issues.

Although still in its early stages, sustainable development reporting is gaining favor among companies. Business leaders are starting to realize that comprehensive reporting helps support company strategy and shows commitment to sustainable development.”
WBCSD (2003)

2.1.6 Summary of issues connecting Sustainable Development and Governance

During the 1990’s the term sustainable development has been consistently used to describe a process of change and development that balances social, economic and

environmental impacts in development choices. Whilst there has been extensive debate about definitions and content, a consensus has emerged that guides intergovernmental policy and sectoral guidelines.

Whilst it was Brundtland (WCED, 1987) who drew our attention to the lack of capacity of ‘social organisation’ to make sustainable development choices, and Agenda 21 (UN, 1992) set out a comprehensive list of capacity building and institutional issues as a part of the SD agenda, the full extent of the governance agenda and its relevance to sustainable development has only become apparent from global events such as the UN Millennium Declaration (UN, 2000) and the WSSD (2002). The Millennium Development Goals set out in the Millennium Declaration have been factored into national development plans by world governments.

Thus, governance issues have consistently been discussed round the relationships between and behaviour of governmental and intergovernmental organisations on the one hand, while on the other, corporate governance – dealing with the relationships between and behaviour of companies, their directors and critical stakeholders.

What is also evident from the corporate governance perspective is that the social, environmental and economic components of sustainable development become integral to a company’s corporate governance framework. This is mainly to satisfy increasing demands from stakeholders for reporting on social, environmental and economic performance.

2.2 Sustainable Development and the Built Environment

This section explores how the concept and practice of sustainable development has impacted on and is applied in the built environment sector. We look briefly at its history and refer to critical documents that demonstrate how sustainable development has been translated into policies and practice throughout the built environment for both developed and developing countries.

2.2.1 History, basic principles and philosophies

First, it is important to contextualise the analysis by briefly looking at the global construction industry, which according to CICA (2002) contributes up to 10 % of Gross National Product (GNP), employs 111million people worldwide and accounts for approximately 28% of all industrial employment. The industry consumes vast quantities of raw materials, and in the example of Europe, buildings, which are the final product of the construction industry, consume 50% of all consumed energy. There is no doubt that construction and the built environment sector has a significant impact on the state of the environment and the ability to make development sustainable in the future.

There has always been a strong contingent of researchers and practitioners who have promoted the benefits of environmental issues in the built environment. Specific examples include the philosophies of architectural heroes such as Buckminster Fuller (undated) and the practical activities of people like Morgan-Grenville who created the Centre for Alternative Technology (CAT) in Macynlleth Wales in 1973.

The emphasis at CAT, as with many initiatives born of the 70's and 80's was on alternative technologies in partnership with alternative lifestyles. Whilst it is easy to criticise the 'hair shirt and sandals' approach taken by many of the activists at that time, it was common for building design to be seen as part of a wider picture and there are consistent messages of that time referring to holistic approaches to design and development. In fact, Lark (2004) maintains the connection between lifestyle and

environmental impacts of the built environment when he says ‘Alternative Lifestyles interrelate with architecture’. Modern economic philosophies such as Natural Capitalism incorporates whole systems thinking, doing more with less and advocating nature’s principles of design as prescribed by Hawken et al (1999).

Historically, the UK’s Building Research Establishment (BRE) has also played an important role in the built environment related environmental research. Less inclined to follow the ‘lifestyle’ trends of Buckminster Fuller or CAT, research at BRE is orientated towards raising standards and improving building regulations in support of UK government policy.

Nevertheless, research and development carried out at BRE during the 1980’s and 1990’s has had a significant impact on developments in sustainable construction research, technology and practice around the world. The examples given below demonstrate the priorities of the UK Government and provide examples of BRE’s influence on sustainable construction research and practice. For example:

- The UK Department of Environment’s Best Practice Energy Efficiency Programme was managed by the Building Research Energy Conservation Support (BRECSU 1990-99) Unit – and was typical of how energy technology research of the 1980’s was utilized in national dissemination programmes of the 1990’s.
- Building Research Establishment Environmental Assessment Methodologies (BREEAM 1990-93) is a set of assessment tools and environmental labels developed at BRE during the 1990’s and replicated in many countries including Canada, Hong Kong and South Africa. This is another good example of how the emphasis turned from energy efficiency to broader environmental concerns during the 1980’s and early 1990’s. The BREEAM schemes gradually evolved over that time to include minor social aspects of the environmental impact of buildings. They continued to evolve during the 2000’s in line with UK Government priorities with the ECO-HOMES programme perhaps the most notable.

- The Environment Division – a major research division with established world experts in most of the major technical domains associated with the environmental agenda in buildings. It's research remit included work by world experts in: natural lighting (Littlefair P), natural ventilation (Perera L), water efficiency (Smith P), indoor air quality and sick building syndrome (Raw G), amongst many other specialist areas of concern.
- The Centre for Sustainable Construction was also a pioneering unit set up in 1996 to pursue research and consultancy in areas such as environmental assessment, sustainable construction, urban sustainability and life cycle analysis of materials and buildings - adding up to a more holistic approach to sustainability in the built environment. This led the way, certainly for BRE, into the sustainable construction agenda pursued vigorously since the late 1990's.

In the same way that BRE undeniably lead the way in many areas of research into technical environmental issues and the broader sustainable construction agenda in Britain, other research establishments were active in many countries including the Scandinavian countries, the Netherlands, USA, Canada, France and Germany.

For a global perspective on the direction of these different contributions, we can turn to the International Council for Research and Innovation in Building and Construction (CIB) which represents over 500 major research establishments around the world. It has a comprehensive programme of dissemination and coordination activities and it has, what it calls, a pro-active approach to sustainable construction (Kibert, 1994).

The CIB's pro-active approach to sustainable construction started in 1998 following the completion of a global report on sustainable development and the future of construction (Bourdeau et al, 1998). The report based its enquiry on the definition for sustainable construction: *“the creation and responsible management of a healthy built environment based on resource efficient and ecological principles”* The study was focused on

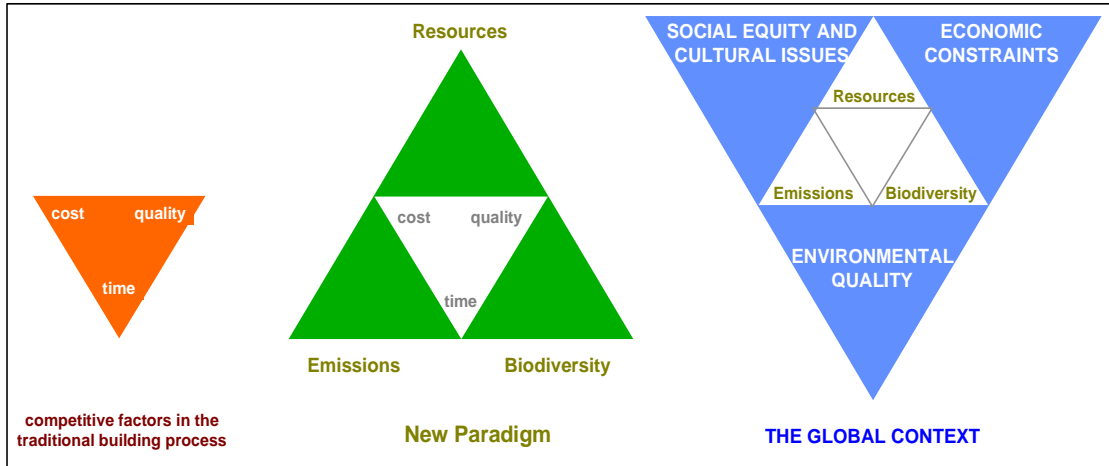
investigating the relationship, and clearly defining the links, between the principles of sustainable development and the construction sector.

The main report included a comprehensive analysis and synthesis of the findings based on 14 country reports. It revealed that, not only was the state of the sector different in each of the countries but, interpretations of sustainable development, remedies and approaches were also very different. Whilst the Kibert definition used as the point of reference in the project was inherently 'environmental' many social and economic issues were raised in the country reports and considered as part of the sustainable building agenda.

Examples of difference ranged from the use of different words to convey the meaning of sustainable development in different languages to one particular example regarding the attitudes of respondents in Romania towards recycling of materials. The Romanians reported that there was significant resistance to recycling and reusing materials because of the associations with the recently deposed oppressive regime. As far as they were concerned 'new' was good and an expression of their new-found freedom, 'recycled' was bad. It was examples like this that illustrated the enormous socio-political hurdle that built environment must assail to achieve sustainability. This illustrative example also makes it very clear that, in order to identify the most appropriate sustainable development strategy in the built environment, it would be necessary to understand the socio-political and cultural context of the country in which the developments were to be applied.

The CIB report combined the new findings with existing concepts such as that based on Vanegas et al (1996) to develop and scope new relationships for activities associated with sustainable development and the construction sector. What is apparent from Figure 3 to many for the first time was how sustainable development expanded the traditional boundaries of the construction sector to include social, economic and environmental issues.

Figure 3: Sustainable Development Boundaries



Source: Vanegas et al (1996) in Bourdeau L, Huovila P, Lanting R, Gilham A. (Eds) (1998)

The main conclusion drawn in the report was that:

“Current practices are widely different depending on how well the concept of sustainable building is developed in the various countries. There is also a marked difference between the developed market economies, transition economies and developing economies. The more mature economies pay more attention to the creation of a sustainable building stock either by new developments or by upgrading their existing building stock. In the transition economies the emphasis is on new developments (reduction of housing shortage), by learning from Western experience, and making improvements to their transport networks. In the developing economies social equity is much higher on the agenda than environmental concerns. Social and economic sustainability (e.g. job creation) is given much more thought.”

2.2.2 Sustainable Building and Sustainable Construction

In 1998, CIB commenced what it called a pro-active approach to Sustainable Construction. As a result of the CIB report (Bourdeau et al, 1998) noted above, the CIB developed their Agenda 21 Sustainable Construction (CIB, 1999) which aimed to set a comprehensive agenda to guide future research in the area. And, in a later collaboration with the United Nations Environment Programme (UNEP), CIB published their Agenda 21 for sustainable construction in developing countries (UNEP/CIB, 2002). CIB continues its 'pro active approach' to sustainable construction continuing to be very evident on their web site and with conferences on sustainable construction taking place throughout the world, the CIB continues to be a point of reference for this research in gauging the relevance and currency of the conclusions and outputs.

At the outset of this research in 2004, CIB's web site listed the activities of 14 working commissions and task groups that aimed to contribute to their sustainable construction agenda. They included the following: Task Group TG 34- Regeneration of the Built Environment; Task Group TG 38- Urban Sustainability; Task Group TG 39 – Deconstruction; Task Group TG 43 – Megacities; Task Group TG 45 - Performance Indicators for Urban Development; Task Group TG 48 - Social and Economic Aspects of Sustainable Construction; Working Commission W 067 - Energy Conservation in the Built Environment; Working Commission W 082 - Future Studies in Construction; Project: CRISP - Development of Performance Indicators for a Sustainable Built Environment; Working Commission W 083 - Roofing Materials and Systems - Project: Sustainable Roofing; Working Commission W 092 - Procurement Systems - Project: Sustainability and Procurement; Working Commission W 100 - Environmental Assessment of Buildings; Working Commission W 104 - Open Building Implementation - Project: Open Building Life Cycle Costs and Sustainability; Working Commission W 105 - Life Time Engineering in Construction; Working Commission W 108 - Climate Change and the Built Environment.

It was evident from a more detailed review of the CIB web site that not all of these working commissions and task groups were as productive as others. None of the groups

were concerned with ‘governance’ as a specific subject and only the following were potentially looking at socio-cultural and decision making issues related in some way to the content of this investigation: TG 38, TG 45, TG 48, W082, W092, W100.

Amongst these, W082, lead an excellent work on indicators through the CRISP (CIB, 2004a) project since 1999. This is a CIB-lead project involving a network of 24 research establishments from 16 European countries. The project aims to produce a database containing both indicator systems and individual indicators with comprehensive information retrieval procedures. Because the methodologies are similar between CRISP and this project, there is a good chance that the governance framework output from this project will add a global perspective to the European perspective of CRISP. Both projects include defining a framework for better understanding.

Interestingly, whilst the numbers and themes of CIB working groups and commissions changes, there appears to be a continuing lack of real focus on socio-political and cultural factors within the built environment research world. Furthermore, the CIB (2009) website shows no working groups or commissions, amongst the 53 listed, that deal with governance as a main subject and only one, TG 69 Green Buildings and the Law, which is concerned with an important component of the overall governance agenda.

Another project that set out to address differences in policy and practice between different countries is the Green Building Challenge (GBC, 2004). This is an international collaborative effort that aimed to compare the environmental assessment methodologies that had emerged around the world to *‘develop a building environmental assessment tool that exposes and addresses controversial aspects of building performance and from which the participating countries can selectively draw ideas to either incorporate into or modify their own tools.’*

As well as comparing the technical aspects of building design that differ throughout the world, the comparative nature of GBC also allowed cultural and institutional components

to be identified and considered more fully. A comprehensive ‘GBTool’ has been developed and this work continues subject to funding.

However, the CIB report (Bourdeau et al, 1998) indicates that socio-political and cultural factors pose greater barriers to successful implementation of sustainable solutions than lack of technical know-how. This very premise, that corporate culture alone was a major barrier to implementing energy and environmental policies in the UK, was the inspiration behind the UK Government’s Corporate Energy Management workshops and guidance publications in the Energy Efficiency Best Practice Programme (BRECSU: 1990-1999).

It is important to emphasise the vital role that projects like CRISP, GBC, CIB’s project in Revaluing Construction (Courtney et al, 2003) and this investigation have in making the link between socio-political and cultural factors and sustainable development in the built environment. For example, outputs from projects like the corporate energy management work in the UK, help provide tools that integrate sustainability practices into everyday business, including design and management practices. As CIB indicated in their proposal document for VALUECONSTRUCT: *“all parties to construction seek value but have inadequate means of characterizing and expressing their goals”* (CIB, 2003). In many ways this replicates the problems previously encountered in ‘valuing’ the environment in development models.

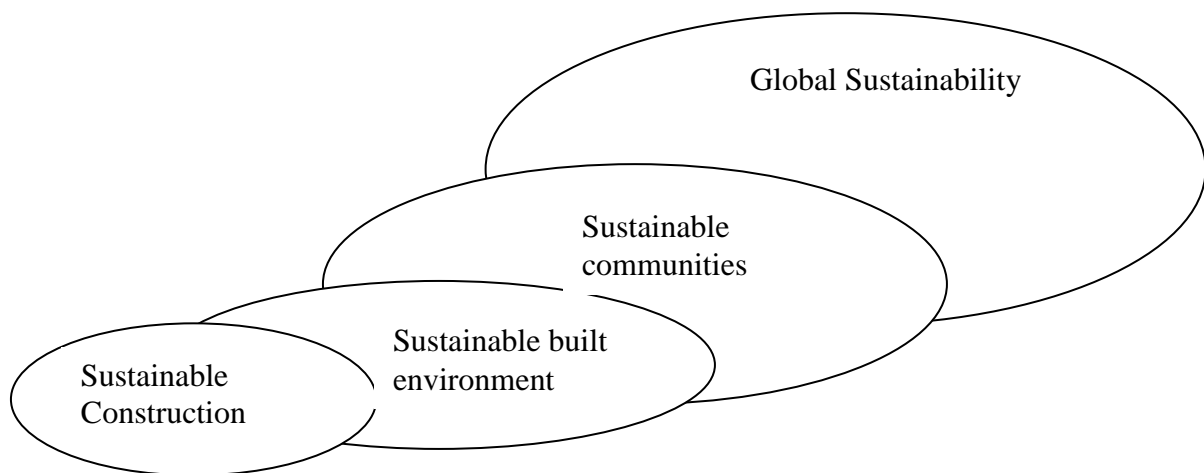
The differences between critical stakeholders within the sector, such as clients, designers and contractors, have been explored in projects in the UK (Latham, 1994, and Egan, 1998 and 2002). However, different values lie at the heart of different needs and this is most evident in comparing conditions in developed and developing countries. Therefore, in regard to the comparison between developed and developing countries, it is vital to understand what aspects of the sustainable development agenda are valued most in those countries. In the case of this study, it is anticipated that the views of policy makers and practitioners will be sought to provide guidance.

2.2.3 Sustainable communities, urban sustainability and sustainable cities

The urban level of decision making is an important level to consider in relation to sustainable development and the built environment. Irurah (2002) sees *“a broader view of construction as the process/mechanism for the realization of human settlements and especially as it relates to basic needs such as shelter, infrastructure and related services.”*

As shown in Figure 4, the urban, city or settlement level of decision making is perhaps one of the most complex and important for integrating social, environmental and economic factors into decision making. Early attempts to structure the analysis of sustainable development within the UK built environment sector included Barrett et al (1999) who aimed to differentiate between levels of complexity in scale and content for sustainable construction, sustainable built environment, sustainable communities and global sustainability.

Figure 4: Decision Making for Sustainable Built Environment



Source: Barrett et al (1999)

At each level of Figure 4, the spatial and temporal boundaries expand to include more socio-political and cultural factors outside of the construction and built environment

sector. This thinking was embedded in the UK's sustainable construction research agenda developed by the Construction Research and Innovation Strategy Panel (CRISP).

However, there are a couple of implications for this project, when considering a stepped approach as suggested by Barrett et al (1999). First of all, the title of the project is aimed at a governance framework for the '*built environment sector*' and Barrett's conclusions would suggest that considerations should include sustainable construction but not extend to the sustainable communities level. There is an overwhelming case for extending sustainable development debates within the built environment beyond the construction industry to encompass all stakeholders, including the communities. In fact, as revealed in the priori theorising, Meadows (1999) says that the highest order change takes place with the 'paradigm' suggesting that the case for sustainable development in the built environment will be decided by conditions outside the sector which require the 'paradigm' shift in how decisions are made. This is particularly the case with regards to governance standards and the need to cover all spatial categories. The second point to note is that, a governance framework will need to function at each level and that the inputs and outputs are likely to be different at each level.

Defining sustainable development at the communities' level has proved to be a challenge but some useful definitions have been provided by du Plessis (2002) that throw more light on the meaning and significance of the concept of sustainability at the human settlement level. This is especially the case with regards to urban and city scale:

- Urban sustainability – '*broader process of creating sustainable human settlements, especially towns and cities. It includes sustainable construction, but also the creation of institutional, social and economic systems that support sustainable development*'.
- Sustainable human settlements – '*those cities, towns and villages and their communities which enable us to live in a manner that supports the state of sustainability and the principles of sustainable development.*'

In particular, Girardet (1999) defines a sustainable city as being: *'organised so as to enable all its citizens to meet their own needs and to enhance their well-being without damaging the natural world or endangering the living conditions of other people, now or in the future.'* By including both environmental factors as well as the role of municipal authorities and democratic decision making as components of achieving a sustainable city, Girardet (1999) reinforces the thinking that sustainable development within the built environment sector is endogenously and exogenously influenced.

Whereas in sustainable construction or built environment scenarios (Barrett et al, 1999), it is most often the technology and science that prevail in both policy and implementation measures, the urban and community agenda is dominated by the social and economic factors of development. The scope immediately broadens to include structural, institutional and governmental issues as Hildebrand (1999) points out: *'Slums and squatter settlements are the result of failures in governance and public policy in coping with rapid urbanization'*. Girardet (1999), Hildebrand (1999) and UNEP/CIB (2002) reinforce the need to consider rural and urban issues at the same time because urbanization, and particularly the problems caused by rapid urbanization, result from people in rural areas moving to urban areas to avoid political unrest and/or satisfy their economic and social needs.

Based on a similar relationship between rural and urban environments, Girardet (1999) goes on to discuss how cities consume environmental resources independent of their local geographical conditions by spreading their ecological footprint well beyond the city's physical limits. As earlier discussed, there are numerous definitions of sustainable development yet it is intergovernmental, governmental and corporate policy that dictates what sustainable development is in practical terms demonstrated by the dominance of the Millennium Development Goals and the Global Reporting Initiative. This influence of inter-governmental precedent is true at the urban level too.

At the intergovernmental level, the Habitat Agenda (UN, 1996) is the main political document with over 100 commitments and 600 recommendations on human settlement

issues. It is a defining document for scoping the sustainable development and governance agendas for the built environment at the urban level. For example, the first two main themes are: The adequate shelter for all; and sustainable human settlements development in an urbanizing world. They both contain topics that cut across environmental, social and economic agendas. The final 3 themes address governance and implementation issues such as: capacity-building and institutional development; international cooperation and coordination; and implementation and follow-up of the Habitat Agenda. The Habitat Agenda recognises that governance issues are a necessary prerequisite for achieving sustainable development at the urban, cities and settlements scale.

Under the auspices of the United Nation's Habitat Agenda, two important resolutions have been passed by the UN which reinforce the importance of values driven decision making at this scale as well as the need for stronger implementation bodies.

The first resolution of the UN General Assembly (2001) reinforces the centrality of human beings to sustainable development and the implementation of the Habitat Agenda. It makes the link between urban and rural social, economic and environmental conditions. It also makes some interesting 'value-based' statements that have a direct impact on key decision making structures in the built environment. For example: It *'reaffirms that the family is the basic unit of society and as such should be strengthened.'* It goes on to say: *'The rights, capabilities and responsibilities of family members must be respected. Human settlements planning should take into account the constructive role of family in the design, development and management of such settlements.'* Both of these statements suggest that the 'family' should be part of the design brief at this scale and built environment professionals should be capable of integrating 'family' considerations into their decision making, perhaps even integrating 'families' into the design team. Interestingly, the impact of kinship relationships on business efficiency in the developing countries is well acknowledged and can be argued to be one of the major causes of poor corporate governance in developing countries. This poses an interesting yet potentially awkward conflict of interest between governance from a corporate perspective and governance from a community perspective.

Nevertheless, UN General Assembly's second resolution in 2002 is a demonstration of global institutional strengthening which appears to fill one of the institutional gaps identified by the UNDP (1999). As a result of this resolution, the United Nations Centre for Human Settlements (UNCHS) is expected to play a stronger role in supporting infrastructure development programmes, housing finance institutions and mechanisms, particularly in the developing countries. This means that UNCHS will play a major role in realising both sustainable development and governance agendas as have been defined at the intergovernmental level. Similarly, UNCHS is also expected to play a more active role as an implementing agency and this is already evident in Ghana, as reported in a recent workshop in Accra (ARC, 2005), where it is supporting actions to improve the conditions of slum dwellers in Accra.

Another example of how governance continues to be a dominant issue for sustainable development at the urban scale can be found also in the UN Habitat report (2002) from the first World Urban Forum. It said, in relation to achieving sustainable urban development, that:

'Fundamental bottlenecks are local implementation capacities and sound governance - rather than lack of technology, funding or international agreements. The task of overcoming these bottlenecks touches on many different topics and issues such as decentralisation, institutional reform, training and capacity building, empowerment, governance, broad-based participatory decision-making, etc.'

In response, the UN calls for: *increased transparency and accountability in relation to local democracy; 'new social and economical responsibilities for municipalities in developing countries'; and 'production of global reports as a multi-stakeholder exercise'*

Outputs from the World Urban Forum (2002) reinforced the significance of decentralisation, institutional reform and capacity building to the global governance agenda and further confirm the central role of governance to achieving sustainable development at the urban scale. Whilst the Habitat agenda represents largely the

developing world perspective on human settlements, it is useful to consider also the European perspective. Europe is more urbanized with more than 80% of the European population living in cities and towns. Starting with the Aalborg Charter (EU, 1994) environmental and social reforms such as International Council for Local Environmental Initiatives (ICLEI, 2003) model communities' programme have been evident at the urban scale. The EU's 6th Community Environment Action Programme set out the sustainable development agenda in 4 themes: (i) Sustainable Urban Transport (SUT); (ii) Sustainable Urban Management (SUM); (iii) Sustainable Construction (SC); and (iv) Sustainable Urban Design (SUD)

The built environment is central to all of these themes and the importance of governance issues such as institutional, regulatory and decision making capacity is amplified in reports such as the final report by the Working Group on sustainable urban management (EU, 2004) where a range of problems, limiting the achievement of urban sustainability, are cited as follows:

- Limited cooperation beyond administrative borders
- Limited horizontal cooperation
- Lack and/or under use of data, tools and practices
- Participation and involvement of the public is not sufficiently integrated into the decisions making process
- Limited vertical cooperation between different governmental and administrative levels
- Lack of institutional capacity and willingness to learn
- Separation of planning and implementation or neglect of implementation

It is interesting to reflect on the similarity of implementation problems identified for both developed and developing countries when looking at urban and community scale decision making. In conclusion, there is a consistent message from intergovernmental organisations, regional governments and researchers that governance is a core component for achieving sustainable development at the urban community scale and that many of the

implementation issues affecting good governance are shared by developed and developing countries.

As du Plessis (CIB, 1998) argues:

“Key factors already known to affect the quality of urban development include: planning and regeneration policies, transport and service infrastructures, provision for safe and secure environments, provision for appropriate health, welfare and leisure facilities, decision making structures and levels of public participation, finance initiatives, investment policies and forms of procurement and job creation and opportunities for wealth distribution.”

Addressing these issues as individual concerns is important. However, addressing the interaction between different issues and providing support and guidance to policy makers and practitioners who have to deal with these issues on a daily basis is even more critical. The need still exists for a common framework of understanding and decision making at this level. CIB's TG38 (CIB, 1998) initially made the proposal to develop guidelines for decision making, which explore existing decision making protocols employed throughout the planning and development process, map the interfaces between the different actors and tiers of decision making, identify the key priorities and differences for each group and develop a common language to enhance understanding and effective communication.

Recognising the complexity and range of issues associated with decision making at this scale, the scope of a Governance framework needs to be limited to that which is practical and relevant to critical decision makers. This is necessary to provide the much needed common framework for understanding and interaction between critical stakeholder groups.

2.2.4 Sustainable Construction in Developing Countries

Whilst the CIB report (Bourdeau et al, 1998) identified considerable differences in the understanding and approach to sustainable development between the developed and developing countries, which has implications for the construction sector, it was not until November 2000 that work started on a special Agenda 21 for Sustainable Construction in Developing Countries. The report was subsequently published by UNEP/CIB (2002) at the WSSD in Johannesburg.

This is a substantive report which sets out a comprehensive agenda of issues associated with the achievement of sustainable construction in developing countries. It includes a comprehensive discussion and clarification of definitions; it discusses the different models for development with a detailed exploration of environmental, social and economic impacts. As stated in the report, the quality and substance of the report owes a great deal to the regional position papers submitted by respected authors from Africa, Asia and Latin America.

Whilst the discussion is incomplete in the case of both developed and developing countries, the two CIB documents UNEP/CIB (2002).and CIB (1999), together with the regional position papers on sustainable construction in Africa (Ebohon et al., 2002, Irurah 2002 and Adebayo 2002) provide an invaluable source of information in scoping the global sustainable construction agenda.

For example, Ebohon et al (2002) points out that, *'A marked distinction exists between the developed countries and their developing counterparts in their ability to deal with environmental problems.'* Irurah (2002) illustrates how closely social issues are connected to environmental issues in developing countries. For example, he describes how shack construction predominant in sub-Saharan Africa is inherently sustainable as far as it re-uses and recycles materials, and demonstrates how structures can expand or contract depending on user needs. All of which are qualities prescribed for more sustainable construction. However, the formation of informal settlements are indicators of extreme poverty, social exclusion and environmental degradation which many have

argued is not just down to issues of lack of resources but more so of lack of governance and accountability framework to facilitate effective socio-economic development. In fact, the nebulous concept of sustainable development underscores Irurah's definition given that sustainable construction does not rest with reuse or the use of recycled materials alone. This may go some way to satisfy environmental sustainability but fails short by other sustainability criteria, particularly cultural sustainability where we can relate it to the Romania example where people were not culturally satisfied by the use of recycled materials. In the case of Africa, shanty-towns may appear sustainable by the predominant use of recycled materials but, as Irurah (2002) points out, shanty towns are in themselves unsustainable and the result of a breakdown of governance.

The two Agenda 21 documents (CIB,1999 and UNEP/CIB, 2002) provide a basis for comparing a world view of what sustainable construction constitutes in developed and developing countries and will be used in this study as the basis for our global analysis and validation of the theoretical governance framework.

2.2.5 Summary - Sustainable Development and the Built Environment

The construction sector and built environment as a whole play a significant role in human and economic development. It has also been proven to have a substantial impact on the natural environment through its use of natural resources, waste and pollution streams from both construction processes and buildings use and the aesthetic impact on the landscape.

The concept of sustainable development in the built environment, especially with regards to sustainable construction and urban sustainability, has grown in prominence and coverage over the last 10 years. There is extensive technical knowledge available to construction practitioners although predominantly aimed at the technical requirements of developed countries and there are an increasing number of projects coming to fruition designed to utilise environmental technologies. Therefore, whilst one accepts that decision makers throughout the built environment sector will play an increasingly

important role in achieving environmental sustainability, it is already recognized that there are considerable institutional and capacity constraints in developing countries which limit their effectiveness (Ebohon et al, 1997). Whilst the challenges are very different for built environment decision makers in developed and developing countries, the capacity to integrate sustainable development into their decision making is an important social aspect of the sustainable development agenda.

There have been notable attempts to provide leadership in policy development at various levels such as at the intergovernmental level, the regional governmental level, and at national governmental levels. These efforts are permeating down through the industry and there are notable examples, where government and industry leaders are playing a substantial role in the practical implementation of sustainable development principles.

There are also considerable efforts now being made to systematically understand the requirements for sustainable development in the built environment of developing countries. These conditions and needs are different to those in developed countries and Adebayo (2002) noted the assumption that norms and systems from developed countries are necessarily applicable to developing countries. Indeed, Ebohon et al (2002) have argued this not to be the case given the profound lack and dysfunctioning of institutions in the developing countries. Ebohon et al (2004) identify further problems for developing countries which range from poor prioritization methodologies for infrastructure investment, inadequate construction capacity, low levels of training and corruption.

These latter examples demonstrate the importance and significance of global governance issues to sustainable development in developing countries. There exist considerable knowledge gaps particularly in regard to how the socio-political and cultural factors affect the ability of the various sectors of the economy to achieve sustainable development. We can see that despite the recognition of its importance in practice, there is little evidence in the literature that suggests any progress has been made in understanding the interface between the socio-cultural and environmental aspects of sustainable development. This is especially the case with regards to how socio-cultural

conditions affect the ability of individual organisations and the construction sector as a whole to achieve sustainable development.

2.3 Governance and the Built Environment

This section explores how the concept and practice of Governance has impacted on and is applied in the Built Environment. In Section 2.1 we saw how both sustainable development and governance agendas emerged during the 1990's, and the two governance agendas identified in the global analysis so far include:

- Global governance – dealing with the relationships between and behaviour of governmental and intergovernmental organisations; and
- Corporate governance – dealing with the relationships between and behaviour of companies, their Directors and critical stakeholders.

What is also evident from the literature is that both global and corporate governance agendas have merged with the sustainable development agenda. Not only did it emerge that governance of natural resources was a critical issue for the built environment sector but process issues such as decision making and participatory structures, management and human resources were important aspects of both sustainable development and governance agendas for the built environment sector. It was evident that the urban-cities scale demands the most understanding of what we refer to as global governance issues, as institutions such as multilateral and unilateral organisations have identified the importance of institutional capacity in accommodating human needs at the cities scale.

2.3.1 Global Governance Issues in the Built Environment

Governance was identified in UNEP/CIB (2002) as one of 4 macro-scale factors required for achieving sustainable construction. The factors identified include political stability, transparent governance, economic growth, and redistribution of wealth. Their absence often results in the lack of macro-level transparent governance where: *“the construction industry becomes tainted with unfair practices, especially corruption in bidding, tendering and contract awards as well as throughout the construction process.”* (UNEP/CIB, 2002)

However, the importance of management and organisation as well as standards and regulations for sustainable construction in different countries has been ascertained (CIB, 1999), setting out a broad agenda of social, cultural and economic issues. These issues range from promoting equity between nations and generations, ethical procurement and investment policies, and participation in decision making. These constitute key principles underlying the moral code or attitude that can guide decision makers in different groups and be adapted to specific areas of responsibility. Nevertheless, the need for a common framework or guidance document spelling out the responsibilities of the various stakeholders within the built environment regarding sustainable development is overwhelming.

There is clear evidence of the relevance of governance to achieving sustainable development in the built environment and particularly how conditions vary between developed and developing countries. Ebohon et al (2002), point out *'the marked differences in technical and financial capacities as well as the differences in institutional capacity'* that exist between developed and developing countries to indicate the challenges of effecting sustainable development practices. Institutional capacity is of concern in underpinning effective policy formulation and implementation. Specifically, Ebohon et al (2002) argues that developed countries have, through legal, planning, and economic institutions, robust fiscal and regulatory policies to *'steer the construction industry towards environmentally sustainable practices'*. This is evident in a wide range of policies and strategies which started with the UK's DETR's approach to sustainable construction (UKGOV, 2000a), developments in the 'planning gain' approach as explained by Marsh (2003) and more recent procurement policies such as those developed for the Olympic Development Agency (ODA, 2006).

However, and in the case of the developing countries, Ebohon et al (2002) further argues that *'The significance of institutions as a necessary prerequisite to environmental sustainability is often ignored, especially in the case of developing countries where they are assumed to be present, allowing policies that are largely incongruent to the*

peculiarities of these economies to be formulated.' Thus, *'the absence of effective institutions to facilitate policies and underpin implementation has been accorded much less recognition in the literature on construction industry development'* (Ebohon, et al., 2002). It is evident from investigations so far that institutional development is a core aspect of global and national governance and so a critical concern for institutions associated with the built environment sector. This institutional problem is further compounded for sub-Saharan Africa, as Ebohon et al (2002) have argued that with the exception of South Africa, construction sectors in sub-Saharan Africa are fragmented, lacking coordination, skills, and competencies, which makes it exceedingly difficult to apply regulations and improvement programmes.

In dealing with the 'structure, conduct and performance' of construction sectors in sub-Saharan Africa, Ebohon et al (2002) discussed how conditions vary from developed countries and how construction firms have different roles to play in relation to society. The relation between governments, organisations and society is an interesting issue when comparing developed and developing countries. Evidence collected in Ghana as preliminary research to this study supports Ebohon et al's (2002) assertion of the different role the construction sector has to play in society. In discussions with delegates on GIMPA's Corporate Governance course (2003-4), although none of the attendants are connected with the built environment, it was evident that there were significant shortfalls in local institutional and organizational capacities and conditions, for example the strong family ties in Ghanaian society; compromising the 'separate entity' principle of corporate governance; and creating significant barriers to improvements in governance and performance in general is a case in point.

The implication of such findings is that the generally accepted standards and rules of both global and corporate governance agendas need to be validated in relation to the societies in developing countries such as Ghana. There is every reason to believe that these tensions will exist in construction firms in Ghana. It is also interesting to consider the remedies for achieving good governance in the built environment sectors of sub-Saharan Africa with the high level of participants operating in the informal sector; and therefore

outside the regulatory framework of government. Family ties and values may well be a more effective mechanism for regulating their behavior than the formal structures accepted in developed countries.

The lack of domestic capacity also leads to differentiation between local and international firms in development projects in sub-Saharan Africa. Ebohon et al (2002) provide comprehensive evidence that demonstrates how local firms have neither the skills, economic status or stability to take on large scale developments. Large scale infrastructure development takes place in developing countries as a result of intergovernmental loans and usually through the professional services of international consulting groups. We have already seen how these developments are a potential point of conflict for the construction firms involved and CICA (2002) highlight the international financial institution's critical role in setting standards for sustainable construction in such projects.

Carpenter et al (2001) raise the point that a wide range of stakeholders are involved in these large infrastructure projects including: Intergovernmental organisations such as UN; Supranational governments such as EU; National governments of nation states; Global, regional and local NGOs; Local governments and planning authorities; Private and public planning and design companies; and Industrial enterprises such as contractors and providers of materials and goods.

Not only does this present a very complex and multi-cultural decision making environment which stretches the boundaries of governance and decision making structures in general, it means that, for developing countries, the majority of decision makers are outside of the country in which the development will take place. We have already seen how the role of intergovernmental bodies such as the IMF and World Bank could be seen to be imposing inappropriate standards of global and corporate governance in developing countries and so it is a question of the ability of 'foreign' design and management teams to make decisions that are appropriate to the nation in which the development is taking place.

It suggests a special need for a governance framework for infrastructure development projects such as these but also a governance framework which enables genuine, stakeholder responsive decision making in multi-cultural development teams.

2.3.2 Corporate Governance and the Built Environment

UNEP/CIB (2002) expressed their concern, regarding lack of governance as an enabler for sustainable construction, regarding ‘tainting’ the construction process. Nowhere is this better highlighted than by the work of Friends of the Earth (FOE), on Corporations and Global Trade (FOE, 2004). FOE’s work includes campaigns highlighting ‘bad practice’ by global corporations of which 13 of the 27 companies identified operate in the built environment sector and includes special reports on firms such as BAA plc, AMEC plc, Balfour Beatty on their social and environmental activities. In a more constructive approach the World Wildlife Fund, has applied its Panda Bear logo to indicate developments that consider sustainability issues (WWF, 2001) and thus apply pressure to improve governance and sustainability performance in the built environment sector.

Firms such as Skanska, Carrillion, WSP Group and Arup are examples of companies that have taken a strategic approach to extending their corporate governance agenda. Through case studies (CIRIA, 2001 and 2003) they have demonstrated the effective use of social and environmental indicators as indicators of good corporate performance. Needless to say that in practice, the development of corporate governance standards in businesses goes hand-in-hand with the development of new products and services. In fact the researcher’s experience as Director of Sustainability for WSP (1999-2001) suggests that a company’s core commitment to sustainable development is directly related to its ability to develop and deliver ‘sustainability’ products and services (WSP, 2000).

However, there is evidence of firms aiming to increase the practical implementation of the Corporate Social Responsibility agenda in the built environment sector, including CIRIA’s RP671 project (CIRIA, 2004). This project aimed to develop a practical toolkit

to enable construction clients and other stakeholders to understand, integrate, and monitor social responsibility throughout the life cycle of a construction project. This project also exemplifies the future direction of efforts at achieving sustainable development practices within the built environment sector, namely, many companies and organisations such as the Princes Foundation, the New Economics Foundation, and Buro Happold work in collaboration.

Similarly, the Chartered Institute of Building (CIOB, 2003) in the UK provides guidance on corporate social responsibility for its members to reflect its commitments to the corporate governance agenda. This agenda is set out in terms of government policy and the business case for practical implementation of CSR agenda in the construction industry. Indeed, the UK's Sustainable Construction Task Group (SCTG, 2001) put forward the 'business case' for more pro-active approaches to corporate social responsibility in the construction industry. It concludes that:

“ Bottom line performance and shareholder value have been shown time and again, to be enhanced for those companies that take their environmental and social responsibility seriously.”

Reporting across the triple bottom line of social, environmental and economic performance also appears to be on the increase for many corporations involved in the built environment sector. For example, of the 341 companies reported (GRI, 2002) as piloting the Global Reporting Initiative Reporting Guidelines, 105 were associated with the built environment as construction companies, utility providers, mining and aggregates suppliers, infrastructure developers, property owners and construction product manufacturers.

However, whilst there is mounting evidence of practical implementation, there is only limited evidence of a systematic analysis of why some built environment organisations take what has been described as a 'defensive' approach (Bourdeau et al, 1998) or an 'offensive' (CIB, 1999) or a 'Quality-added' approach (Carpenter et al, 2001). An

analysis of this nature would provide a better understanding of the barriers to wider implementation of governance and sustainability practices. However, whilst a greater understanding of relationships between culture and change has been sought by many authors, such as Rokeach (1972), Mintzberg (1989), Hofstede (1991 and 2002), Handy (1993), Herriot et al (1995), Belbin (1996), Hesselbein (1997), Trompenaars et al (1998), Cameron et al (1999), Mullins (2002) and Rollinson (2002), there are few examples of the relationship between corporate culture, change and performance in the built environment sector having been explored. The Greening Industry Network (GIN, 1997) first addressed the way industries responded to environmental demands. The Building Research Energy Conservation and Support Unit (BRECSU, 1995, 1996a & 1996b) provided some interesting examples, in which the relationship between organization, culture and improved environmental performance in the built environment are explored and guidance is given. Windborne et al (1999 and 2001) aimed to identify what factors might drive change in the European property market. BRE (1999) developed a management tool to assess the capacity of organizations to manage sustainable development and Gilham (2000) explored four factors which affected the likely response from built environment stakeholders to sustainable development, as follows:

1. the position of the organisation in a sector's decision making hierarchy (i.e. policy orientation or production orientation),
2. the type of organisation typified by its corporate culture (recognizing that different corporate cultures facilitate or block certain behaviour),
3. the aspirations of individuals and the organisation as a whole and their willingness to drive through change
4. the actual ability, in terms of skills capacity, etc, of the organisation to respond

Evidence gained from questionnaires completed by delegates on an Executive Programme on Corporate Governance (GIMPA, 2003-2004) and reported by Gilham (2004b) indicates that corporate behaviour in Ghana is influenced by the same 4 factors. However, there are dominant characteristics that need special attention in Ghana such as the relationships between corporations, government and family, the dominance of

‘hierarchical’ corporate cultures, more ‘family’ orientated executives, and lower skills levels all round.

2.3.3 Summary of Governance and the Built Environment Sector

A wide range of policy, research and guidance literature has shown that Governance is both an internal and external enabler for achieving Sustainable Development in the Built Environment sector.

Decision making for sustainable development requires that different priorities apply to stakeholders at different levels and the general trend being that decision makers need to take more factors and more stakeholders into consideration. As Vanegas et al (1996) has indicated, sustainable development extends decision making from predominantly project-based time, cost and quality considerations, to first of all, including the wider impacts of resource consumption, emissions and biodiversity onto wider ranging issues such as social equity, economic constraints and environmental quality. Thus extending stakeholders accepted spatial and temporal boundaries, challenging sovereignty, institutional structures, systems and processes as well as exposing core values to scrutiny by other groups. Therefore, new decision making tools are needed to handle this broadening agenda.

Similarly, we established that whilst considerable progress had been made on technical issues, little progress had been made on the social factors and the lack of multi-stakeholder decision making tools has proven to be a substantial barrier to implementing sustainable development practices and solutions. The literature has determined that this is not only the case for the built environment sector but extends to general decision making for sustainable development (UNU, 2002).

These conclusions are particularly exciting because this project was inspired by the possibility that a governance-led approach to decision making could provide a framework on which to improve the level of understanding between stakeholders, enhance their decision making capacity, and subsequently improve the opportunities, for achieving

sustainable development in the built environment sector. It appears that this approach may have wider application.

2.4 Conclusions of the Literature Review

In pursuit of the research deliverables (see 1.4), Objective 1 required that the relationships between sustainable development, governance and the built environment be explored to identify the gaps in the literature and establish the relevance of the proposed research, drawing conclusions to further inform the research methodology.

In regards to the relationship between sustainable development and governance, the literature has confirmed how governance is integral to achieving sustainable development both in ensuring balanced social, environmental and economic outcomes and also in ensuring proper consultation and decision making throughout the process. This is a critical conclusion indicating the suitability of a governance framework as a framework in which to improve decision making for sustainable development.

The literature shows how this applies to both global and corporate governance agendas, for which the literature demonstrates how they are merging. This further indicates the potential global applicability of a governance framework to achieving sustainable development.

Furthermore, the literature provides examples where governments are setting both compulsory and voluntary standards for corporate governance where corporations play a balancing role, with government and civil society, as the key stakeholders within a national governance framework.

The conclusion reached in section 2.2.5 is that the built environment plays a major role in human and economic development as well as having a significant impact on the natural environment through its use of natural resources, waste and pollution streams from both construction processes and buildings use. The literature shows that the built environment sector is integral to the achievement of sustainable development.

Objective 1 also requires that the literature demonstrates that *‘Governance is an integral component of performance in the built environment sector’*. Good governance was described (UNEP/CIB, 2002) as an external enabler for sustainable development in the built environment sector. The literature demonstrates how firms operating in the built environment are subject to governance criteria common to other sectors and therefore should be considered both an internal and external enabler. The need to improve governance in the built environment sector is gaining wider acceptance at the governmental and multilateral levels although this affects stakeholders differently in developed and developing countries. For example, with increasing involvement in social and environmental issues, through either the ‘pro-active’ or ‘eco-efficiency’ approaches (CIB, 1999), there is growing evidence that built environment firms in developed countries are beginning to understand the impact of good governance, and improved environmental performance on their overall corporate performance. However, the ‘governance’ emphasis in developing countries is aimed primarily at regulatory and institutional reform of the public sector with capacity building support for an embryonic private sector and civil society.

Where there is evidence that firms pay attention to the governance agendas they are predominantly larger construction and design firms operating in countries that have defined corporate and regulatory frameworks which include: well formed and resourced governmental institutions; laws and regulations; industry standards; a competent and well resourced private sector; and a well informed and organized civil society to either create market forces (for environmental goods and services) or ensure balance in the overall governance of the country.

With some exceptions of ‘niche-market’ suppliers, smaller firms, although predominate in the industry, appear to be less inclined to address sustainable development practices. At the moment it is uncertain whether this is because of cost restraints, skills capacity or cultural reasons related to either the clients they serve or the values by which they are driven. In developing countries, small firms and operatives tend to be ‘informal’, meaning their activities are unregulated and they are vulnerable to abuse and

marginalization. In these cases the role of larger contracting firms, as employers and de facto regulators of the informal sector, is critical to improving performance.

It is evident throughout Chapter 2 that, unlike both global and corporate governance agendas, governance in relation to the built environment is not explored and rarely identified as an issue of concern. This is even the case in the extensive literature generated by the various working commissions and task groups of the CIB updated at the time of writing up this report (CIB, 2009). Governance, as a factor affecting sustainable development and general performance in the sector is not explored.

Therefore, as well as revealing a significant gap in the literature on governance and the built environment, the literature has demonstrated that:

1. Governance is an integral component of the sustainable development agenda
2. Sustainable development is embedded in built environment policy and practice – although the literature shows how this predominates in developed countries and is less consistently achieved in developing countries. It is noted also that practice generally lags behind policy.
3. Governance is relevant to individual built environment stakeholders and the sector as a whole but lacks consistency in understanding its application and influence. There is evidence that poor governance impacts on performance throughout the built environment sector of both developed and developing countries with some of the starkest examples of poor performance caused by inadequate governance being found in developing countries

Therefore, Objective 1 of the research has been achieved.

The remainder of the study will aim to develop the required governance framework (The Aim) through a process involving: the construction of a theoretical framework (Objective 2); testing for global applicability (Objective 3); and relevance to policy makers and practitioners as a mechanism for effective analysis and decision making (Objective 4).

CHAPTER 3

Ph D Research Methodology

Chapter 3 contains a description of the scope and structure of the PhD research including a review of the applied methodology. The selection of techniques used for data collection and analysis are described including preparations required for the contingent valuation case study.

3.1 Proposed Structure of the Research

In Chapter 2 the literature demonstrated how governance was integral to sustainable development and performance in the built environment, thus allowing the Study to proceed with the development and testing of a theoretical governance framework suitable for use in the built environment sectors of developed and developing countries.

It was determined from the outset (see 1.3) that the scope and methodology must be realistic and achievable bearing in mind the limitations of timescale for implementing the research. Advice from the assessors of the Transfer Report reinforced the need to ‘further clarify’ the methodology and focus on a case study approach that reinforced the importance of the Governance Framework as the key to enhancing sustainable development in the built environment sector.

The research was therefore structured to achieve the stated objectives as follows:

The theoretical governance framework will be developed through a qualitative analytical (exegital) approach based on good global and corporate governance principles and practice as contained in the literature. Once developed, the theoretical framework will be critically assessed and compared with the requirements for sustainable development in the built environment as described in CIB Agenda 21(1999) and UNEP/CIB Agenda 21 for Developing countries (2002). Together, these documents provided a uniquely comprehensive description of global policies and practices suitable for achieving sustainable development in the built environment sector.

The analysis therefore aimed to satisfy Research Objective 2 (see 1.4.2); also providing first indication of the frameworks global validity and its suitability for application to the built environment sector. The development of the theoretical governance framework is described in Chapter 4.

The theoretical governance framework was further assessed for global validity through a comparative analysis of arrangements, currently in place in the UK and Ghana, which govern the achievement of sustainable development in their respective built environment sectors. The analysis of data collected in these case studies is presented in Chapter 5 and contributes towards Research Objective 3

As a third and final test of global validity, Ghana's built environment professionals were used as a further case study in which a contingent valuation approach was used to identify and compare the preferences of local policy makers and practitioners with the theoretical framework. As determined from the outset, the involvement of built environment policy makers and practitioners was particularly important as they were to be the primary target group for the outputs of the Study. This analysis concluded Research Objective 4.

Data was collected in the controlled environment of a national workshop through focus group sessions and papers submitted by 11 keynote speakers selected for their expertise and standing in the areas of good governance and the built environment sector. The analysis of data collected from participants is reported in Chapter 6

A summary of findings from the tests for global applicability, a report on practical application, potential policy guidance and a brief output-to-purpose review of the research are presented in Chapter 7 aiming to satisfy Research Objective 4 and complete the presentation of Outputs from the research (1.4.3).

3.2 Research Methods

Working within the scope (see 1.3) and structure (see 3.1) two primary methods emerged as suitable for the research:

1. The Case Study method
2. The Contingent Valuation

3.2.1 The Case Study

The Case Study method was identified from the outset of the project because it is well suited to validating a previously developed model, theory or framework with a given target group (Soy, 1997).

There are many definitions and understandings of the case study method of research. According to Bromley (1990), it is a "systematic inquiry into an event or a set of related events which aims to describe and explain the phenomenon of interest".

Whilst the goal of the case study method is to describe as accurately as possible the fullest, most complete description of the case, there are many different kinds of case study. As determined in 1.3 (Figure 1), this Study aimed to build and test a governance framework for global applicability including guidance for policy makers and practitioners. The key feature of a case study is its evidence basis for various analysis, learning and professional applications. Specifically, Yin (1984 in Soy, 1997) defines the case study method as 'an empirical inquiry that investigates a contemporary phenomenon within its real-life context.' In this Study, the contemporary phenomenon under investigation was 'governance' and the requirement was to test the relevance of a theoretical governance framework in the reality of the UK and Ghanaian built environment sectors with specific interest in its relevance to policy makers and practitioners. The case study method therefore was ideally suited to the type of research being undertaken in this Study.

According to Yin (1984, in Soy, 1997), the case study design must have five components: (i) the research question(s), (ii) its propositions, (iii) its unit(s) of analysis, (iv) a determination of how the data are linked to the propositions, and (v) criteria to interpret the findings.

In this case, the built environment sectors of the UK and Ghana provided the first case study. The data collected for analysis were the governance arrangements that impact on the achievement of sustainable development in the built environment sector (Chapter 5). The analysis helped determine whether ‘a governance framework could enhance decision making’ in the built environment sector of developed and developing countries.

The second case study provided the platform for the second empirical analysis technique employed in the research; the contingent valuation. In this case, data was collected on Ghana’s built environment stakeholders to identify and compare the preferences of local policy makers and practitioners with the theoretical framework and therefore further test the global applicability of the theoretical governance framework (Chapter 6). The use of policy makers and practitioners as the source of data was essential to ensuring the relevance of the research deliverables.

3.2.2 Contingent Valuation method

The second research method proposed for the study was the contingent valuation. Perhaps most commonly known as a hypothetical method which asks people to make choices based on a hypothetical scenario (King et al, 2000), it is commonly used to assign a monetary value to an environmental service or facility. Camacho-Cuena et al (2003) say there are a number of techniques suitable for questioning subjects including: (i) Questionnaires which compare open ended questions with real case purchase scenarios; (ii) dichotomous questions; and (iii) experiments in which subjects reveal their preferences by acting in a controlled environment.

The third option was chosen as the basis of the contingent valuation undertaken. It was selected as a method to collect data from the key target groups of the study, namely built environment policy makers and practitioners. In this case study, data was collected from the key target groups, in the controlled environment of a national workshop, through focus group sessions and 11 keynote speakers. Based on their knowledge and experience, participants presented the key governance issues affecting Ghana's built environment sector, therefore revealing their preferences in the topic of governance for sustainable development in the built environment sector. Analytical techniques were applied to the qualitative data collected, to analyse and compare the preferences stated by participants with the theoretical governance framework. The techniques used in the study are described in the following sections.

3.3 Data collection and Analysis

3.3.1 Data Collection

Typical of the case study method, a range of research techniques were considered for collecting data including: interviews; focus groups; documentary sources; observation; questionnaires; ranking exercises; and visual methods (Laws et al 2003). Twumasi (2001) provided a comparative list, suitable for collecting data in Ghanaian communities to include: questionnaires; interviewing; direct observation; participant observation; case studies; life history; the use of documentary evidence; letters; personal memoranda; diaries; public records; panel discussion; and group discussions. Thus, there were a range of techniques commonly used in both developed and developing countries that could be selected for the study.

Techniques subsequently used in this project include:

- Documentary sources: The literature review (Chapter 2); Critical analysis of the literature to develop the theoretical governance framework (Chapter 4); Developing and designing the research project (Chapter 1 and 3); Case study Validation and contingent valuation (Chapters 5, 6 and 7); Comparative analysis of developed and developing countries (Chapters 2, 4, 5, 6 and 7).
- Focus groups in a workshop format were part of the validation process with built environment stakeholders.(Chapter 6)
- Personal statements in the form of papers written and presented by invited speakers at the Workshop (Chapter 6)
- Personal/professional guidance from the Registrar of the Architects Registration Council of Ghana (one of the leading built environment institutions in Ghana) as mentor to the author for the development of preparatory material for the National-level workshop in Ghana.(Chapter 6)

3.3.2 Sampling

Three components needed to be determined for each case study: Sampling Frame, Sample Size and Samples.

'A sampling frame is a complete list of all the units in the population which we are including in our research' Laws et al (2003). The Sampling Frame for the research is therefore determined by the data that is to be collected and the purpose to which the data will be put.

In the first case study (Chapter 5) the sampling frame included: Policies, laws, regulations, institutions, stakeholders, organizational mandates and practices identifiable with achieving sustainable development in the built environment sector. The purpose of this sampling frame was to provide the basis of comparative analysis of governance arrangements that currently impact on the achievement of sustainable development in the built environment sector of the selected case study countries.

In the second case study the sampling frame was harder to define. Ideally, it should have included all built environment policy makers and practitioners in Ghana. However, without data on the number of formal and informal 'practitioners' involved in the built environment sector, it was necessary to identify a proxy. In this case 'Built environment professionals' were chosen for three very practical reasons: (i) because they were generally contactable through their professional bodies; (ii) because they populate the more influential organizations in Ghana's built environment sector; and therefore (iii) they are the best equipped to provide the data required for the study and the most likely group to utilize the research outputs.

Two key points of reference were used to determine the size of the sampling frame: (i) the 2004 Business directory (SURF, 2004), (ii) the membership lists of the Institute of Architects (GIA), Institution of Engineers (GhIE), Institute of Planners (GIP), Institute of Surveyors.

Table 1: Categories of built environment organizations listed in Business Directory

		REGIONAL LISTINGS									
	Category	Accra	Ashanti	Brong Ahafo	Central	Eastern	Northern	Upper East	Upper West	Volta	Western
A	Architects	70	3	1	1	1	1	0	0	0	2
B	Construction and building contractors	142	17	1	11	3	1	0	1	0	17
C	Construction Building Materials	196	15	0	0	0	0	0	0	0	12
D	Civil Engineering and road building	112	9	1	1	1	0	0	0	0	15
E	Consultants: Engineering	9	0	0	1	0	0	0	0	0	0
F	Consultants Environment	2	0	0	0	0	0	0	0	0	0
G	Consultants: Quantity Surveyors	2	0	0	0	0	0	0	0	0	0
H	Consultants: Real Estate	162	5	0	1	0	0	0	0	0	2
I	Real Estate Developers	96	0	0	0	0	0	0	0	0	1
J	Road Contractors	18	7	0	0	0	0	0	0	0	7
K	Surveyors and Valuers	18	0	0	0	0	0	0	0	0	0
	ESTIMATE OF TOTAL	757	56	3	15	5	2	0	1	0	56

Grand total of private sector firms listed in the business directory associated with Ghana's built environment sector: 895 total listings.

Some observations: (i) The total number of listings included many duplications particularly between categories B, C, D and J and between categories H and I. Also, some of the regional listings include regional offices of Accra-listed companies. We deduce therefore, that the number of firms is less than those listed.

This business directory is inherently skewed towards the larger and formally recognized firms. It provides no evidence of smaller scale contractors operating in the regions although most of the smaller and generally informal contractors will work through these larger organizations. The directory provides no evidence of unqualified technicians providing some form of design service. However, the directory does indicate how the built environment sector is based primarily on Accra as its administrative base.

Sources at the listed professional bodies indicated their memberships as follows:

- Architects (full and technician status) 350
- Engineers (all disciplines and categories) 1500
- Surveyors (all disciplines and categories) 600

Therefore bringing the two sets of data together suggests that a pool of approximately 2,400 professionals are employed in approximately 750 listed private sector organizations and the public sector Ministries, Departments and Agencies concerned with the built environment sector. The Sampling Frame therefore consisted of approximately 2,400 built environment professionals in Ghana.

In each case the Sample Size and Samples were to be determined by a ‘purposive’ approach as one of two approaches suggested by Laws et al (2003), that is: i) Probability or random samples; or ii) Non-probability or purposive samples. Each approach offers advantages and disadvantages to different situations and the choice of the ‘purposive’ approach for this project was based on the nature of data required from the project, the sample groups available, the type of information and data to be provided. Purposive, or theoretical sampling, is one approach Laws et al (2003) suggest for qualitative research which is suitable for emerging areas of exploration as this project has been identified. It is

also a practical approach for single researchers who can only work on one face of a research project at a time. In this case, the researcher starts from a theoretically determined point, collecting and analyzing data as he/she goes from the first sample group. This initial analysis leads to the identification of other sample groups by which the researcher collects and analyses data. In so doing the researcher may identify other sample groups and so the process continues until the limits of the theory being explored has been exhausted. This is also known as Snowball sampling.

This technique was employed in the Literature Review (Chapter 2). In that case the search started with sample groups known to be active in sustainable development issues and through an exploration of the literature subsequently identified the global and corporate governance agendas. In so doing other sample groups were identified related to both global and corporate governance agendas and the search progressed on to work with a sample group representing built environment stakeholders. All the time, the data collected was adding to our understanding and the development of our particular theory. This approach brought us to a point where we determined a sampling frame suitable for research in the built environment sector, which relates to the ‘global’ and anticipated ‘local’ situations.

Purposive or theoretical sampling was used throughout the preparations for the national workshop in Ghana. Work commenced on planning the Ghanaian workshop in December 2003 with approaches being made by the Researcher to the Architects Registration Council of Ghana (ARC-Ghana). ARC-Ghana is a government agency which oversees and regulates all architectural practice in Ghana. It is the only professional body in the built environment sector mandated by law to uphold standards and regulations. Following presentations to the ‘Council’ permission was given to proceed with planning the workshop. The involvement of ARC Ghana was crucial to the potential success of the workshop and the Council’s positive response, i.e. agreement to host and fund the workshop, indicated that governance was highly relevant to built environment professionals in Ghana.

In May 2004, the selection process commenced and it consisted of the following steps:

1. ARC-Ghana selected (purposive/theoretical sampling) key government ministries and approached their senior representatives.
2. ARC-Ghana approached (purposive/theoretical sampling) all of the other built environment professional bodies in Ghana
3. ARC-Ghana approached (purposive/theoretical sampling) large international and local building contractors and manufacturing companies in Ghana
4. Through the relevant ministry, ARC-Ghana contacted (purposive/theoretical sampling) key local government representatives.
5. ARC-Ghana approached 11 keynote speakers drawn from different areas of policy and practice in regard to Governance and the built environment
6. Adverts were placed in the general press and Ghana's trade press to attract as wide a range of participants to the workshop as possible (random sampling)

Throughout the process, ARC-Ghana worked through locally accepted protocols and channels of communication in the respective stakeholder groups. As well as direct approaches being made to invited or selected senior representatives, the workshop was open to any participant who chose to attend. Therefore the majority of participants were self-selecting and therefore randomly chosen within specified groupings or clusters – in that they alone chose to turn up to the event and select which focus group to attend.

Whilst efforts had been made to attract a wide and representative sample to the workshop local experience suggested some imbalances were likely. For example, there would most likely be a dominance of architects as the event was linked to the ARC-Ghana's annual general meeting attracting over 300 architects from throughout Ghana. It was likely that a high level of representatives would come from the public sector because of the easy access from the Ministries area in Accra, thus making it an attractive event for civil servants. There was likely to be under-representation from areas outside Accra due to costs and difficulties in traveling, although, as indicated by the directory listings (SURF, 2004), this appears not to be a serious problem for the private sector companies.

However, it is particularly relevant to local government in Ghana which, at the time of the event, was spread throughout 138 District, Municipal and Metropolitan Assemblies. Although large private sector companies had shown an interest, there was likely to be under representation from small and medium sized companies and their unions. It was also predicted that road-builders and infrastructure developers would not be well represented, although government ministry reps were included and, as evidenced by the duplication of directory listings (SURF, 2004) private sector contractors tend to work in both infrastructure and building.

Remedies to address the anticipated imbalances were implemented in the run up to the workshop including: (i) Continued publicity in construction sector technical publications and general press; (ii) Further promotion of the event to non-architectural professional bodies through their senior post holders involved in the organisation of the event (to avert a dominance of Architects); (iii) High level representation to Government ministries to ensure key decision makers were encouraged to attend; (iv) Financial support for some District Assembly members from outside Accra to attend the workshop; (v) Invitations to trade union representatives.

Following all of the preparations described above, the **Sample** from which data was collected in the second case study comprised:

- 120, self-selecting and invited participants of the Workshop taking part in focus group sessions representing: All of the built environment professional bodies in Ghana; The Ministry of Works and Housing – providing ministerial and technical representation; The Ministry of Local Government, Rural Development and Environment – providing ministerial and technical representation; The Minister of Parliamentary Affairs on behalf of the government executive; Municipal, Metropolitan and District assemblies (ie local government) providing Local government leaders and representatives; The Building and Roads Research Institute – providing director representation; Private contracting companies, real

estate developers, insurers and material suppliers – providing director level and technical representation

- 11 invited speakers submitting papers for detailed qualitative analysis by the author

The Sample therefore consisted of approximately 5% of the estimated Sampling Frame.

3.3.3 Analysis of data – techniques and safeguards

With the use of qualitative data, it is important to use analytical techniques that can be shown to be *‘reasonable and fair’*. Laws et al (2003) suggest leaving an ‘audit trail’ in order that the analysis can be traced step by step. This allows other researchers and users of the information to make their own assessments of its relevance to them. It also allows the researcher to identify points at which alternative methods could be tried in future projects. Laws et al (2003) say that, the analysis of qualitative data revolves far more around the interpretive capacity of the researcher and is therefore more influenced by the researcher’s perspective as already noted. In order to balance this effect Laws et al (2003) argue that *“the most important aspect is to see the same thing from different perspectives and thus be able to challenge or confirm the findings of one method with those from another.”*

The issue of different perspectives has been addressed in several ways. The literature search (Chapter 2) included a wide range of perspectives from Governmental and non-Governmental stakeholders including views from developed and developing countries. Different perspectives on global and corporate governance and sustainable construction in developed and developing countries have been applied to the development of the theoretical governance framework (Chapter 4). The data collected from participants in the national workshop provide different perspectives on policy and practice in Ghana.

The other technique, ‘centering’, as described by Hofstede (2002) requires measures to remove the cultural bias of the researcher. On the basis that, in this case, the researcher is

a British, English speaking male undertaking predominantly qualitative research primarily in a sub-Saharan country, a range of ‘centering’ measures have been employed: (i) The selection of a 1st Supervisor not only for his academic record and standing in Sustainable Development issues but also because he is a Nigerian with extensive technical and cultural understanding of the built environment sectors in sub-Saharan Africa; (ii) The initial selection of a 2nd Supervisor from South Africa also with understanding and experience of built environment sectors in sub-Saharan Africa (due to the unfortunate death of Professor Radford, Dr Taki was nominated as a replacement 2nd supervisor); (iii) Dr Taki, from Lebanon, provided an alternative perspective; (iii) The selection of a Ghanaian professor as the 3rd Supervisor and local mentor; (iv) Mentoring of the researcher by the registrar of the Architects Registration Council-Ghana; and (v) The use of techniques at the workshop allowing sample frames, samples and data to be selected and collected without the influence of the researcher.

3.3.4 Analysis of themes

The analysis of qualitative data requires a process of identifying themes or categories of issues that emerge from the data. Laws et al (2003) suggest that the analysis falls to the researcher to read, sort, understand and interpret the data to fit the objectives of the research. They suggest four techniques for listing and categorisation: i) Cut and Paste (by hand or word-processing soft ware package); ii) Charting – by hand; iii) Card index; and iv) Special Computer software packages.

Following the successive reading of the literature to identify the key themes and issues, two methods, as suggested by Laws et al (2003), were used by the researcher in this study, namely: (i) Cut and paste and (ii) Charting. In the first instance, the researcher used a cut and paste method (using word-processing) in the analysis to develop the theoretical governance framework (CHAPTER 4) taking extracts from the source documents (CIB, 1999 and UNEP/CIB, 2002). The second instance of cut and paste method was in the analysis of speaker’s papers (CHAPTER 6). Charting has been used in two instances, one by the rapporteurs collecting information in the focus groups sessions

at the national workshop (CHAPTER 6) and also by the researcher to create visual images of data collected in Speakers papers (CHAPTER 6). APPENDIX B shows the data collected in the group sessions and APPENDIX C shows the charting technique used by the researcher to analyse data collected in the speakers papers.

3.4 The use of the Workshop Environment

The content of the workshop was determined by the outputs required, namely: Practical guidance on policy and practice for governance and sustainable development in the Ghanaian Built Environment Sector; and Data for analysis in this project

It was agreed with the Architects Registration Council of Ghana (ARC) that the main outputs of the workshop would be:

- A vision statement for the role of the built environment sector in national development, developed and agreed by built environment policy makers and practitioners
- A governance framework for the built environment sector in Ghana in which policy makers and practitioners can work together for effective national development
- A plan of action for the built environment sector as a whole and each of the four stakeholder groups setting out practical changes to existing policies and practice
- A consortium of policy makers and practitioners who would take the agenda and action plan forward in Ghana

The workshop programme was developed to accommodate the two outputs noted above. Timings and order of appearances were planned to satisfy local protocols for public seminars and public appearances by national dignitaries. The full programme and briefing documents are shown in APPENDIX A.

It was proposed by ARC-Ghana that 4 Focus Groups should form the stakeholder groups representing the built environment sector as follows:

1. Government, their ministries and implementation agencies
2. Local government including Metropolitan, Municipal and District Assemblies
3. The professional bodies
4. The private sector

Furthermore, because the workshop involved 4 focus groups it was impossible for the researcher to be involved in all of the data collection at the workshop. It was therefore decided, and agreed by ARC-Ghana, to use a small team of rapporteurs to support the author in collecting data at the workshop, assist the group chairpersons to facilitate their groups and record all discussions, agreements and recommendations made in the group sessions

The rapporteurs were selected by ARC-Ghana and were known to have a good record as rapporteurs with a high level of commitment and interest in the topics being discussed. Briefing sessions were held by the researcher and registrar of the Architects Registration Council, to ensure rapporteurs fully understood their roles and responsibilities for the workshop. (see notes to rapporteurs in APPENDIX A)

On the basis that the workshop was attracting 11 key note speakers with over 100 participants who would be organised into 4 focus group sessions each with its own chair person and rapporteur, it was felt prudent to provide some guidance to key participants. There were several considerations. First the need to ensure an adequate briefing and understanding of the issues to ensure the integrity of the event for the organisers. Second, the need to ensure consistent outputs from the data collection, ie the speakers papers and focus group sessions and third, the need to avoid giving too strong a direction to speakers and delegates and therefore negate their independence and the validation process.

After due consideration and discussion with the ARC-Ghana, the following were considered appropriate. A briefing paper for speakers and organisers was produced, setting out the main concepts of governance and the built environment sector based on the literature review and locally known conditions. This was issued early for comment but with no comments received. Speakers clearly referenced to the briefing paper but, as evidenced by the variety of issues presented in their papers, showed no evidence of being constrained by the contents in any way.

A detailed and structured briefing paper was also produced for each of the 4 focus group chairpersons and rapporteurs. This paper included prompts and suggestions for questions to be asked in the focus group sessions. The rapporteurs were fully briefed and supported during the 2 day workshop by the researcher and registrar of ARC-Ghana. As evidenced by the outputs from the focus group sessions, the briefing notes ensured a consistent framework for data collection in the busy sessions. This worked well for the purposes of data collection and compilation of the output report required by the organisers.

Finally, consideration was given to the DMU research committee suggestion that questionnaires and other material should appear in the local language. In agreement with the organisers of the workshop, this was deemed unnecessary on two counts: (i) Whilst most Ghanaians are multi-lingual, there are 6 main language groups and no one group dominates, and (ii) the official language of Government and the professions is English. All official documentation is in English.

CHAPTER 4

Developing the Theoretical Governance Framework

CHAPTER 4 contains a qualitative analysis of literature, describing global and corporate governance principles, to develop the theoretical governance framework (4.1). Once constructed, and to ensure its applicability to built environment sectors of developed and developing countries, the theoretical governance framework was critically assessed and compared with the requirements for sustainable development in the built environment (4.2) as described by CIB Agenda 21 (1999) and UNEP/CIB Agenda 21 for Developing Countries (2002).

4.1 Scoping and constructing a governance framework

"Governance is the framework of social and economic systems and legal and political structures through which humanity manages itself"

(World Humanity Action Trust, 2002)

The above definition indicates that governance provides the basis upon which systems function. This interpretation is vividly captured by Sir Adrian Cadbury, in Iskander et al (1999), when he argues that *"The governance framework is there to encourage the efficient use of resources and equally to require accountability for the stewardship of those resources. The aim is to align as nearly as possible the interests of individuals, corporations and society"*

An alternative definition of a governance framework has been provided by OECD (2004) as that *"which promotes transparent and efficient markets, is consistent with the rule of law and clearly articulates the division of responsibilities among different supervisory, regulatory and enforcement authorities."* They identify shareholders as a particularly important stakeholder group saying that the governance framework should: Protect and facilitate the exercise of shareholder's rights; ensure the equitable treatment of all shareholders, including minority and foreign shareholders; and enable them to obtain effective redress for violation of their rights. They also reinforce the external role of a governance framework by saying that it should encourage active co-operation between corporations and stakeholders in creating wealth, jobs, and the sustainability of financially sound enterprises and ensure that timely and accurate disclosure is made on all material matters regarding the corporation, including the financial situation, performance, ownership and governance of the company.

In other words a governance framework transcends a single organisation or institution. In the language of corporations, a governance framework becomes a framework in which the board of directors operates to manage and control an organisation to achieve its strategic and operational objectives (OECD 2004, CACG 1999). It also becomes a

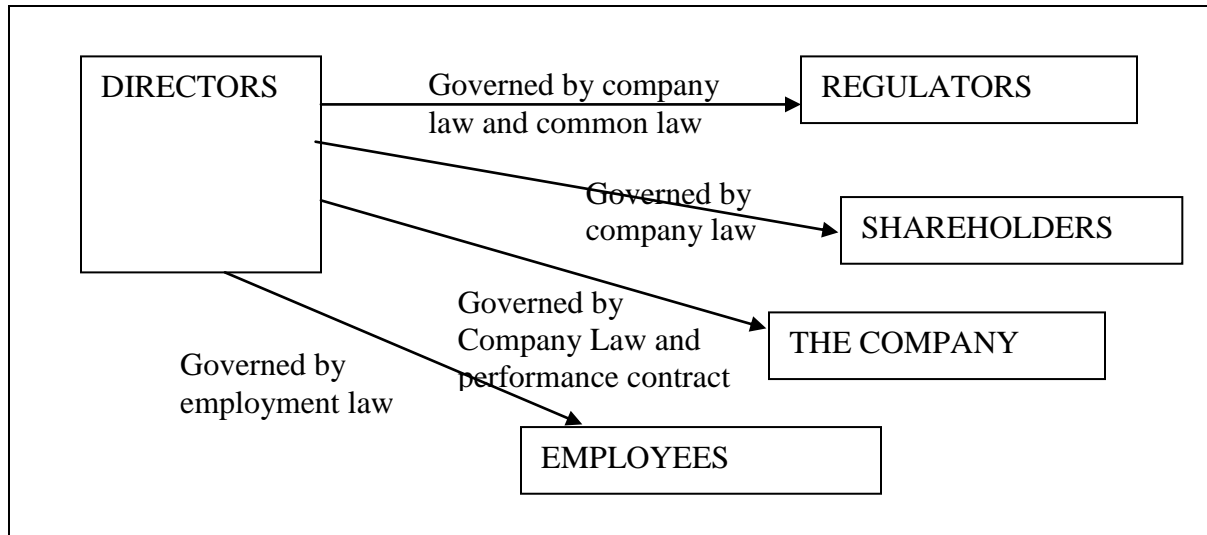
framework for risk management and control (IIA/KPMG, 2003), and contains rules and regulations that help determine roles, responsibilities, authority and influence of the different stakeholders concerned.

From the corporate perspective, once determined, the main function of a governance framework is to inform the development of all corporate (governmental and non-governmental) strategies ensuring that effective measures are taken to satisfy the standards required of them. A governance framework is also therefore a strategic management tool for organizational leaders and policy makers enabling them to develop an effective governance strategy for their group. Adei et al (2003) illustrate this latter point of a governance framework becoming a strategic management tool by describing the roles, responsibilities and relationships of company directors. Reinforcing the point about relationships, Iskander et al (1999) say: *‘The role of stakeholders in corporate governance should be recognised as established by law, and the corporate governance framework should encourage active cooperation between the corporations and stakeholders...’* In fact they argued that the internal and external features come together in different ways to create a range of corporate governance systems that reflect specific market structures, traditions, regulations and cultural and societal values.

Figure 5 below provides a simple example of the kind of system referred to by Iskander et al (1999) by illustrating the primary relationships existing between the directors of a company and 4 key stakeholders as well as the main governance vehicles. In this case a director is governed by common law, company law, employment law and performance contracts for his or her behaviour in relation to different stakeholders.

In this system, the governance framework as promoted by Iskander (1999), Adei (2003) and OECD (2004), comprises 5 groups of stakeholders, namely: The Company, Directors, Regulators, Shareholders, Employees, and 4 types of regulatory mechanism, namely: Company Law, Common Law, Employment Law and Performance contracts.

Figure 5: Corporate Governance system of relationships

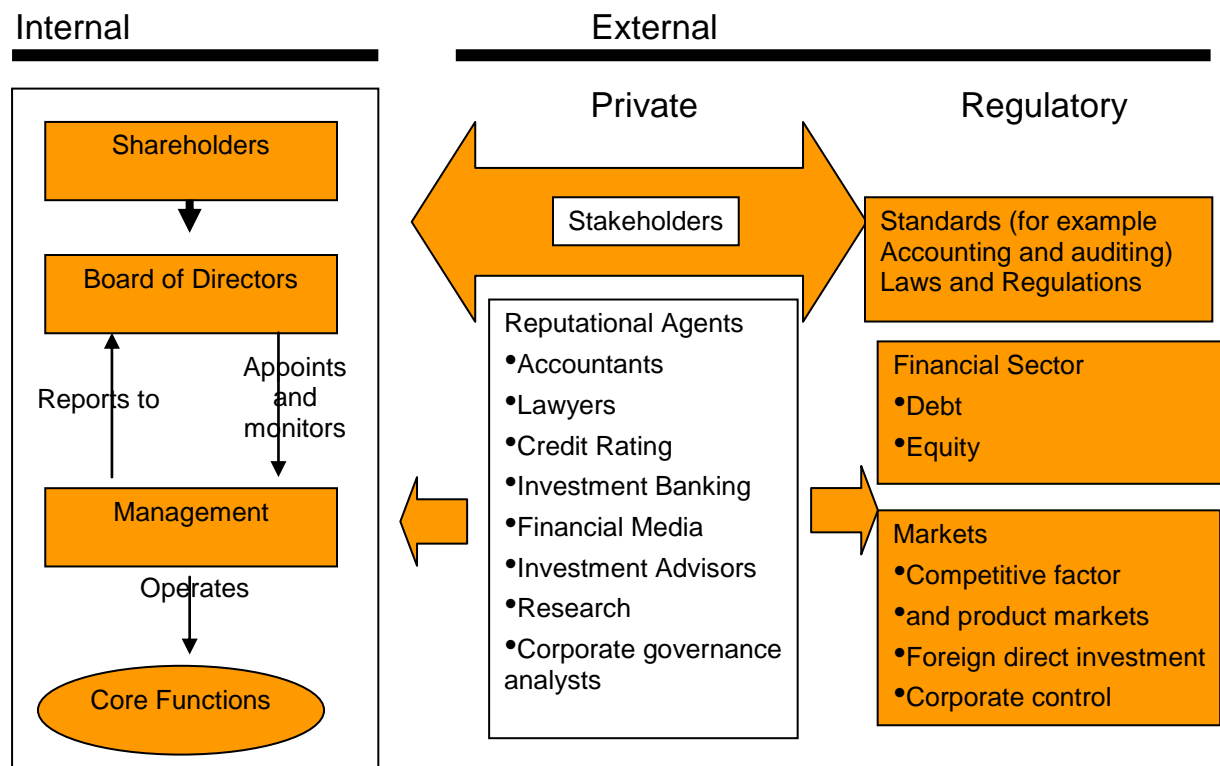


Source: researcher illustrating points made by Iskander et al (1999) and Adei et al (2003)

Systems like this can be constructed to demonstrate other relationships within the framework. In good practice a governance board will analyse these different systems to identify the range of governance measures required for their organisation.

Figure 6 below shows the internal and external architecture of an organization's corporate governance framework as described by Iskander et al (1999). It includes a wider range of stakeholders than those included in Figure 5 above to include what they call, reputational agents all of whom, they say, have an interest in or influence over the modern corporation. Under the regulatory column they also include a range of measures such as: accounting and auditing standards, laws and regulations, debt and equity, market factors such as competition, foreign direct investment and corporate control. The latter suggesting a wider range of regulatory measures than might be applied by laws and regulations.

Figure 6: Internal and External Factors influencing Modern corporations



Source: Iskander et al (1999)

Iskander et al (1999), Adei et al (2003) and OECD (2004) reinforce the importance of internal and external factors affecting an organization's corporate governance framework. For example, Adei et al (2003) provides an extensive list of external factors which have an influence on organizations. For example, national laws and regulations, created by governments, are clearly an external factor as are international, national and sectoral standards such as building codes. These may be standards set by government, professional and/or trade bodies, falling into two categories: compulsory and voluntary. The same goes for environmental and social standards. Some environmental standards are compulsory, such as environmental impact assessments of major development projects, whereas energy or environmental labeling schemes are generally voluntary in nature. Other external factors over which the organisation will not normally have any control will be the changing demands of clients, customers and regulators, the type of organisations that operate as competitors in the sector and changes in the market place. These are common factors to be included in strategic planning and forecasting for

organisations. Finally, Adei et al (2003) mentions the increasingly, technological developments and the cost of compliance (or cost of non-compliance) that are particularly important factors for organisations to consider. For example, many industries rely increasingly on expensive technologies and so, if they are to enter into those markets or reach certain customer groups, the cost of technology will need to be planned for and managed.

Therefore, although some firms will operate in highly complex regulatory environments and other firms will be largely dominated by their market it seems there are a range of external drivers such as laws, regulations, standards and markets, which impact on the corporate governance framework.

Similarly, both Iskander et al (1999) and Adei et al (2003) gave examples of internal factors. Sometimes there is a fine line between an internal and external factor. For example, a government regulation is an external factor. Yet the way the organisation chooses to respond to that regulation is an internal factor. External factors tend to be fixed for all organisations (at least within a class or sector) but internal factors can vary from organisation to organization. Therefore internal factors are those over which the organisation has control and influence. For example: its products and services, which can be developed according to corporate and market requirements. It is, after all, the organisation which decides what its business is going to be, even when it says that it is responding to market demands. Other important internal factors include the history of the organization, its ability to adapt and change and its core values. These factors lie at the heart of any organisation and help define many of its characteristics such as its attitude to risk, the way it plans for the future and practical aspects of strategic management like how it invests in assets and resources including skills and competencies of staff and volunteers. All of these factors are within the control of the organisation. Looking to the outside but still with an internal locus of control, the core values and culture of the organisation also determine the types of relationships which are desired with clients, suppliers, regulators and wider ranging stakeholders. This also includes employee

relations including pay bargaining procedures and the type of operating or working conditions it provides for its staff.

Therefore, when considering internal factors as described above, we conclude that: employees and management are important internal stakeholders; and that ‘drivers’ as we have previously referred, can also include internal rules, procedures and working conditions.

However, another important factor raised for corporations is their capacity to fulfill their obligations. CACG (1999) targeted 4 of its 15 governance principles at the issue of internal capacity. They determined the need for: *Principle 10 – to regularly review processes and procedures to ensure the effectiveness of its internal systems of control, so that its decision-making capability and the accuracy of its reporting and financial results are maintained at a high level at all times; Principle 11 – to regularly assess its performance and effectiveness as a whole, and that of the individual directors, including the chief executive officer; Principle 12 – to appoint the chief executive officer and at least participate in the appointment of senior management, ensure the motivation and protection of intellectual capital intrinsic to the corporation, ensure that there is adequate training in the corporation for management and employees, and a succession plan for senior management; and Principle 13 – to ensure that all technology and systems used in the corporation are adequate to properly run the business and for it to remain a meaningful competitor.*

The point made by the CACG (1999) is that even with procedures and systems in place, the required performance will only be achieved if they are properly maintained and adequately resourced. This is a consistent theme in the literature with Iskander et al (1999) framing it up in terms of an ‘*organisation’s ability to satisfy its core functions*’ and Adei et al (2003) identifying the governance problems associated with poorly formed and inadequately trained Boards further extolling the virtues of continuous training for Board members. As was identified by GIMPA (2003) and Gilham (2004b), in the case of Ghana, there are particularly low levels of awareness, understanding and skills amongst

the boards of Ghana's top 100 companies and this reflects in the overall poor governance performance of Ghanaian corporations, often involving failure to comply with established regulations.

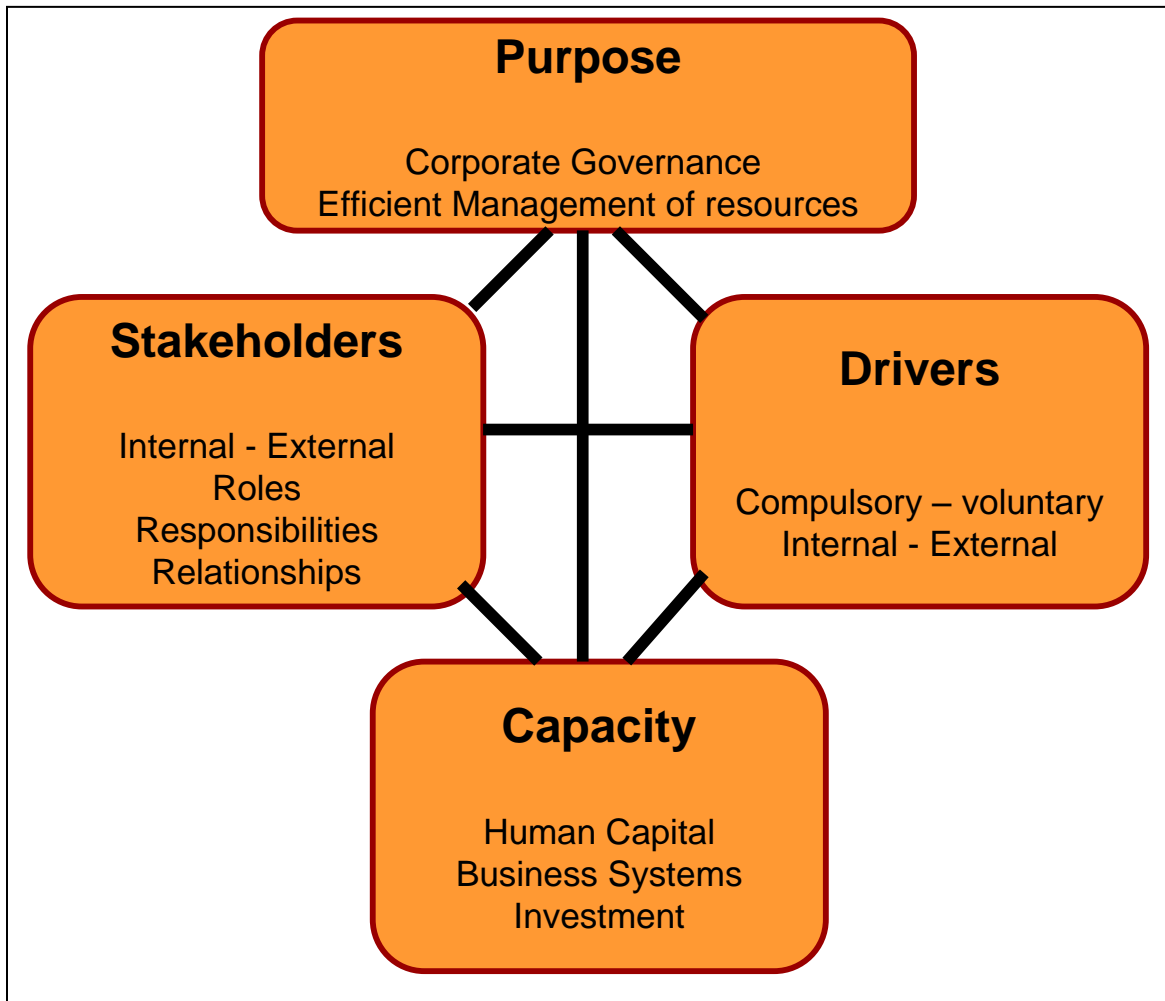
The King report (2002) dedicated a whole section of its guidelines to Human Capital, stating that *"Human capital indicates the latent or potential value that employees at all levels represent for a company. It has been recognised that the development of human capital serves not only the economic interests of the company itself, but also the requirements of the society within which the company operates"*. The report linked the state of corporate governance to the development of 'human capital' not only looking at skills and capacities to fulfill the business processes but also in the areas of demographic representation and employee development.

The importance of capacity as a key component for corporate governance is amplified by the literature.

Therefore, in the process of constructing a theoretical governance framework we can conclude from the analysis carried out so far in this Chapter, that a corporate governance framework should: (i) be a strategic management tool used to achieve corporate objectives; (ii) establish the roles, responsibilities and relationships of, and between, stakeholders; (iii) refer to all rules, regulations and external factors which impact on the corporation; and (iv) consider the internal capacity of corporations, their systems and human capital.

These are represented by 4 Components: Purpose, Stakeholders, Key Drivers, and Capacity. Figure 7 below sets the four components into a framework to draw an initial conclusion to the construction of a theoretical framework, in the context of achieving corporate governance. Whilst links are shown in the figure between the components, no attempt has been made so far to qualify or quantify the significance of those links and they are only indicative of the many relationships identified in the literature.

Figure 7: The Theoretical Governance Framework reflecting key components of corporate governance principles



Source: Researcher

The next stage analysed the suitability of this framework in the context of the global governance agenda.

Novartis (undated) say that "Governance" is the art of public leadership for which they identify three distinct dimensions of governance: (i) the form of political regime; (ii) the process by which authority is exercised in the management of a country's economic and social resources; and (iii) the capacity of governments to design, formulate, and implement policies and discharge functions. They list a range of criteria, which they say constitute good governance namely: legitimacy of government (which they describe as

the degree of "democratization"); accountability of political and official elements of government (media freedom, transparency of decision-making, accountability mechanisms); competence of governments to formulate policies and deliver services; respect for human rights and rule of law (individual and group rights and security, framework for economic and social activity, participation). Should these criteria be included in our governance framework?

We found out more about what people perceive as the purpose of global governance from a programme which commenced in 1992. The Meridian International Institute aimed to identify new concepts of global governance and global citizenship. Their work emerged largely as the Commission on Global Governance (CGG, 1995) which presented its recommendations on global governance. They suggested a global civic ethic with seven core values: respect for life; liberty; justice; equity; mutual respect; caring; and integrity. The text was aspirational and based on the opinions of 28 people largely representing US based policy, research and non-governmental institutions. This work has been criticised for focussing on strengthening the role of the United Nations as a global 'government' and giving what was called an 'elevated' power to non-elected bodies like NGOs. (Ecologic, 1996) However, further insight into the likely purpose of a global governance framework was gained by looking at the outputs of the second Meridian conference on global governance (MII, 1994) in which 3 different visions of global governance were observed: (i) Nation-centered (a future in which sovereign states continue to be the primary players); (ii) World-centered (tending toward some form of 'world government'); and (iii) Multi-centric (in which authority is distributed amongst stakeholders)

The conference participants declared a preference for the multi-centric approach. And, in a presentation at that conference, Dror (1994) identified three functional objectives for the global governance system: (i) Avoid the bad – where he gave examples such as ecological collapse or "doomsday-equipped crazy states"; (ii) Achieve the good – where he gave the example of globalization of human rights; and (iii) To consider what is good and or bad. His argument for the latter point was that we face many unknowns such as

bioengineering, different concepts of global equity and global justice. He felt there was a need to design a process for the constant renewal and readjustment of global governance.

What emerged at that conference was a strong preference for a global, multi-centric, governance system to help identify what is good and bad in order that it can be implemented. Of course, this outcome represents the views of one group of people but it illustrates the complexities of 'purpose' that occur in the global governance context especially where fundamental differences in beliefs and values determine the purpose of global governance.

As indicated by King (2002) a governance framework represents the values of the society in which it is to be applied and this can be relatively well represented in a corporate governance framework by reference to: (i) the legal requirements, or regulatory mechanisms placed on corporations, as we have referred earlier; (ii) the internal factors such as organization and capacity, as referenced by Iskander et al (1999) and Adei et al (2003); and (iii) the importance of corporate culture as a determinant of corporate policy and performance as revealed by authors such as Handy (1986), Hofstede (1991 and 2002) and with particular regard to corporations in the built environment sector: BRECSU (1995, 1996a and 1996b); CIB (1998); and Gilham (2000).

In the pursuit of global governance it should be recognized that the fundamental principles and purpose are likely to vary considerably between groups which come from diverse geographical, cultural, political and philosophical backgrounds. It is important, therefore, to consider how this might be handled within the governance framework for sustainable development in the built environment. For example, could or should we expect architects to share the same purpose as quantity surveyors, local authority planning officers, property investors or home owners when considering development in their respective decision making domain?

The extent to which a governance framework is influenced by subjective judgements is open to intense debates (Peoples et al 1997). At a theoretical level, they identify three

alternative approaches to handle different values and belief systems: (i) Holism – looking for connections and interrelations between groups trying to understand parts in the context of the whole; (ii) Comparativism – where generalizations are made about humans taking into account the full range of cultural diversity; and (iii) Relativism – not evaluate the behaviour of one group by the standards and values of your own, or another culture

Authors such as Maslow (1987) searched for human needs that transcended group boundaries. His thesis was based on determining a set of common human needs which were relative to the state in which a human being found him or herself. Therefore according to Maslow, we could follow the holism principle.

Gyekye (2000) advances the merits of relativism and comparativism. However, whilst recognizing and respecting the diversity of different cultures, he argues strongly against relativism. He says that cultural relativism denies the universality or objectivity of cultural values by asserting that the values held by a particular society, in fact every different society, are true and valid. One of the objective measures Gyekye (2000) uses (to determine which value should prevail) is the ability of a culture to enhance human well being which appears similar to Agrawal (1998) who posits that the ‘ultimate value’ is that of human life. Gyekye (2000) goes on to say that where values and practices no longer serve that end, they should be considered *‘malignant and dysfunctional’*. Whilst Gyekye seems to be agreeing with and reinforcing the holistic approach, he continues to argue for comparativism. He says that just because a value or practice is upheld by a particular culture, does not seem to be a good reason for considering it as valid and off-limits to criticism or evaluation by others outside the culture, especially, where he says *“it turns out to be detrimental to basic human interests and derogates from enhancing human fulfillment”*. His view is that any act that goes against human interests could not be redeemed or vindicated by any culture. He also notes that cultures can become blind to certain beliefs or practices and also, that people from outside the culture often have similar practices in their own cultures with which they relate. In fact the whole basis of cultural borrowing is based on one culture comparing and learning from another culture. He concludes that: *‘The growth of a human culture is in part a function of the critical re-*

evaluation of the values and practice of the culture.' Therefore evaluation and re-evaluation through comparison are critical mechanisms for determining the success of a culture and, one must presume, its ability to sustain itself – i.e. its sustainability.

Whilst Gyekye confirms the inevitability and desirability of comparison between cultures, authors such as Redclift (1987), Inglehart (1996) Hofstede (1991), Maslow (2001), Noorderhaven (2001) point out that people are often inhibited in changing their culture and behaviour by a range of factors such as their living conditions, their wealth, the culture of the organizations in which they work. This is a particularly important point to bear in mind when considering the plight of poor communities, minority groups and organizations in their ability to adopt new governance practices. For example, our attention was drawn to Romania and the unwillingness of its citizens to take on board the principles of materials recycling immediately after the regime change of the 1990's (CIB, 1998).

Comparison is also inevitable through the role of the mass media (MII, 1992) and the increasing importance of civil society organisations. In fact, the sort of issues discussed here replicates the demand for 'transparency' and 'accountability' which have become common requirements for both global and corporate governance agendas. Examples in practice include: increased governmental, intergovernmental and business reporting, checks and balances on intergovernmental governance such as the UK's Parliamentary Committee (UKTC, 2000) which scrutinizes the role of UK appointed directors to the IMF, public-private partnerships and sustainability reporting by corporations (GRI, 2002). In each of these cases, values and cultural practices of one group are being exposed for comparison by other groups.

From the analysis carried out so far, we can conclude that global governance is identified as a process of managing complex social interactions (Heywood, 2002; Hague et al, 2001; WHAT, 2002; Novartis, undated). Novartis say that "*Good governance puts people into the center of development.*", thus reinforcing the 'social' dimension of sustainable development mentioned by Brundtland (WECD, 1987). The complexity of deciding on a

shared vision or purpose is illustrated by the diversity of opinions for example MII (1994) CCG (1995) Dror (1994) and Eco-logic (1996). The need to ensure that any shared vision or aims must be negotiated with all stakeholders involved was previously identified by Peoples et al (1997); to avoid ethnocentrism, and King (2002) for example; to ensure its relevance to the society in which it will be applied.

Comparativism; the comparing of different values and culture (the way things are done), appears to be an integral part of the governance process bringing with it special problems associated with legitimacy and self determination when considering what should be done and by whom. In the current world order, legitimacy is largely determined by the sovereignty of national governments yet in the MII (1992) example above we have seen how even this currently established element of the global governance framework is being challenged – i.e. a dispersed form of governance without government!

As was noted earlier in this Chapter, the purpose of a corporate governance framework is somewhat more easily determined by the legal obligations and corporate objectives of organizations as separate entities. However, there is already considerable evidence to demonstrate how the corporate governance agenda has expanded, through initiatives like corporate social responsibility (CSR), to include social and environmental aspirations. With the increasing convergence between governance and sustainable development agendas (see 2.1.5), we can imagine that the purpose of both global and corporate governance agendas will merge in the near future.

We conclude therefore that ‘Purpose’ is a legitimate component for both global and corporate governance agendas and should be a component of the theoretical governance framework. It is certainly more challenging to conclude what should comprise the Purpose component as this will determine the overall content of the framework. For example, and as was explored in 2.2 by authors such as Vanegas et al (1996) and Barrett et al (1999), decision making for sustainable development occurs at different scales, considering for example; sustainable communities; sustainable resource management; and sustainable construction. In each case the range of Stakeholders, Key Drivers and

Capacities is likely to vary to ensure good governance is achieved. As this project aims to develop a governance framework for the built environment sector, it seems appropriate to allow the content of the Purpose component to be determined from the analysis of built environment literature in 4.2, to follow.

Previously in this chapter it was concluded that ‘Stakeholders’ were also a key component of the corporate governance framework. Analysis of the global governance agenda reinforces the importance of stakeholders; their roles, responsibilities and relationships seemingly more complex and multi-dimensional than in the corporate governance agenda. We conclude therefore that ‘stakeholders’ remains a legitimate component for our theoretical governance framework and will most likely include stakeholders that impact on the built environment at (i) global level, such as the UN and its inter-governmental finance bodies such as the World Bank, international standards organizations and professional bodies; (ii) national level such as government and their regulatory institutions, professional associations and standards bodies; (iii) sectoral level such as construction firms, suppliers and consultancies; and (iv) organizational level such as directors, shareholders and employees.

Analysis of the corporate governance agenda revealed a range of compulsory and voluntary measures applied to corporations. These we called ‘drivers’ and identified them as a third component of a governance framework applicable to corporations. Analysis shows that both compulsory and voluntary drivers also play a significant role in achieving global governance. In fact certain regulatory drivers not only have a direct impact on corporations that operate at a national level but they have an indirect impact through various inter-governmental agencies such as the World Bank, UN Habitat, etc. as they particularly affect development projects in developing countries.

National governments are the primary implementers of laws affecting global governance and sustainable development, however the majority of other drivers for sustainable development, and good governance itself, are socially and culturally dependent such as

market forces, good practice, and quality-related approaches which amount to voluntary actions. This is true even for the actions pursued by the agencies of the United Nations.

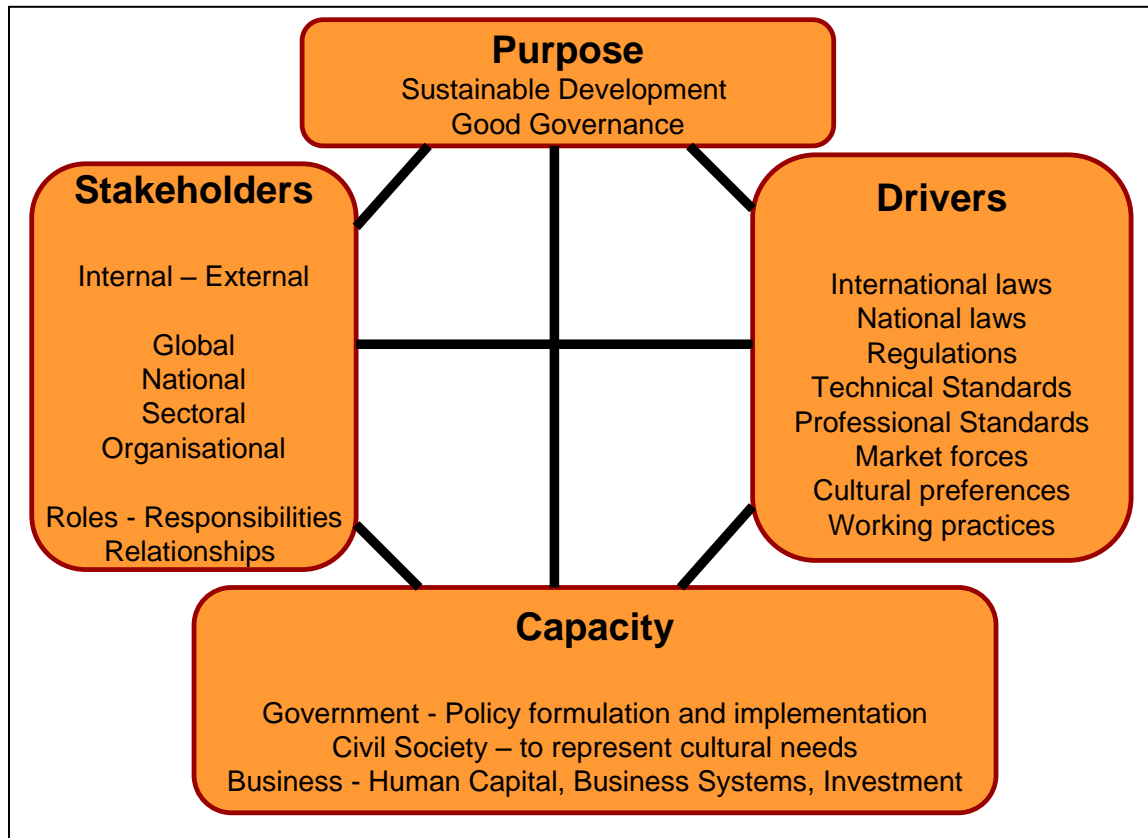
Therefore we conclude that the range of mechanisms applicable to sustainable development goes much wider than regulations. It is proposed to call the third component of our theoretical governance framework ‘Drivers’ to include all national and international laws, regulations, technical and professional standards and practices, market forces where they exist, cultural preferences and working practices that exert pressure on stakeholders to achieve sustainable development in the built environment sector.

The fourth component identified in the context of corporate governance was that of Capacity. In a global governance context, capacity is identified by Novartis (undated) as a necessary requirement especially the ‘*capacity of governments to design, formulate, and implement policies and discharge functions.*’ A balance between the capacity of key stakeholders is essential to good governance. This includes government, business and civil society in the case of national governance (Novartis, undated) and regulators and regulated companies in the case of corporate governance (Cadbury, in Iskander et al, 1999).

It appears therefore that Capacity is a legitimate component of a governance framework suitable for the corporate and global governance agenda and the case for its inclusion in our theoretical framework is further enhanced by the importance of capacity to the achievement of sustainable development as originally identified by Brundtland (WECD, 1987) and the gaps in global governance decision making identified by UNDP (1999).

Therefore, through a qualitative analysis of governance literature, a theoretical governance framework, comprising 4 key components, has been constructed and is presented in Figure 8. An initial scoping of issues to be contained in each Component has been done and these will be further tested for their relevance to sustainable development in the built environment sector in the second part of this Chapter.

Figure 8: The Theoretical Governance Framework reflecting key components of both corporate and global governance principles



Source: Researcher from analysis of governance literature Chapter 4.

Before concluding on the theoretical governance framework, consideration must be given to key words which occur regularly throughout the governance literature and which have not been captured so far in the Components. Key words such as accountability, transparency and ethics are commonly discussed as important aspects of governance.

The framework has been constructed so far, by using what could be described as fundamental building blocks which must be present in any governance system. For example, without a purpose, or stakeholders, or drivers or capacity; governance would not be achievable.

As stated earlier in the text, accountability and transparency are conditions and outcomes expected of a governance system and therefore not fundamental building blocks as have

been identified for the theoretical framework so far. In fact, it can be shown that, with the presence of stakeholders and key drivers such as policies and laws, transparency will improve and accountability will be demanded and more likely achieved. Therefore, accountability and transparency are not eligible as Components in the governance framework.

As is evident from discussions on global governance such as Novartis (undated), CGG (1995), Gyeke (2000), Simai (2002), Hofstede (2002), ‘ethics’ are a set of principles or rules which are an expression of the values and beliefs of a culture or group. They are the basis for determining the preferences of groups. The literature has already revealed preferences which are derived from different values, principles or ethical positions, such as voluntary or compulsory actions and singular or collective actions. To fully account for the preferences of the stakeholder groups for sustainable development identified so far would, itself, be a considerable challenge.

However, the methodology used in this study will provide three opportunities to incorporate the preferences, or ethics, of stakeholders affecting governance in the built environment sectors, namely:

1. In Section 4.2 where the theoretical framework is tested for relevance and global applicability in built environment sectors of developed and developing countries
2. In Chapter 5 where the theoretical framework is further tested for global applicability with existing governance arrangements in the UK and Ghana
3. In Chapter 6 where the theoretical framework is tested for relevance to policy makers and practitioners in Ghana’s built environment sector.

Therefore it is deemed that the methodology will enable the ‘ethics’, ‘principles’ or ‘preferences’ of built environment stakeholders to emerge and become embedded in the theoretical framework as the analysis proceeds. The analysis will continue with the existing 4-component framework but mindful of the need to consider how the desired states of ‘accountability’ and ‘transparency’ can be accommodated.

4.2 A critical assessment of the theoretical governance framework for Sustainable Development in the built environment sector

4.2.1 Introduction

Through a qualitative analysis of governance literature, a theoretical governance framework was constructed in 4.1 based on the key components identified from both corporate and global governance principles (Figure 8). In this section the governance framework is critically assessed for the requirements for sustainable development in the built environment sector. However, because ‘governance’ is a topic that rarely appears in built environment literature, even in the context of sustainable construction or sustainable building, it is necessary to use a source of information that will provide us with as comprehensive a picture as possible.

In this case two documents are used: CIB (1999) Agenda 21 for Sustainable Construction; and UNEP/CIB (2002) Agenda 21 for Sustainable Construction in Developing Countries. These two documents have been chosen because they represent an interpretation of how Agenda 21 for Sustainable Development can be implemented in the built environment sectors throughout the world. They have been compiled by world leading experts, researchers and policy makers from CIB’s global network of over 500 research institutions, thus ensuring access to the latest data and capturing the latest thinking across the world. They combine to provide a developed and developing country perspective on sustainable development in the built environment – both perspectives are essential for this project.

Both documents claim to provide a framework of understanding; addressing wide ranging issues and aiming to analyse the needs, requirements and potential actions of different stakeholders, specifically aimed at achieving sustainable development in the built environment

Therefore through critical analysis in this study, they offer an opportunity to compare and contrast the perceived needs of decision makers in developed and developing countries

and build an understanding of the governance requirements for sustainable development in the built environment sectors of both developed and developing countries.

Whilst there have been many advances in areas of policy development and technical applications, since the first of these two reports was written in 1999, they remain the latest documents to give a global picture of comparative sustainability issues for the sector.

Therefore, using these documents as our source of prescribed actions and requirements for sustainable development, a critical analysis of the theoretical governance framework was undertaken to: (i) determine the relevance and scope of each of the components identified so far, namely: Purpose, Stakeholders, Drivers, and Capacity; (ii) consider if other Components are required; and (iii) compare the requirements of developed and developing countries.

A qualitative analytical technique has been used throughout this Chapter, namely: (i) successive reading of source documents; (ii) collection of data into groups to identify key issues; (iii) analysis and write-up. The data is analysed for each of the four components of the theoretical governance framework.

4.2.2 The Purpose component for the built environment sector

The importance of the built environment sector for development has never been in doubt as this extract demonstrates. *“The construction industry is central to how we shape our future, and to the sustainability of the future. The delivery of appropriate and affordable infrastructure underpins the competitive performance of almost every facet of a country’s industrial, technological and commercial base, as well as the welfare of households and people. The industry impacts on almost every aspect of the realization of human settlement and the creation of infrastructure that supports development.”* (UNEP/CIB 2002). However, the diversity of purpose for the built environment sector was illustrated

by UNEP/CIB (2002) when they called for a new model of development, saying that “*a development model derived from western values and growth patterns increases inequity, causes cultural alienation, loss of cultural wisdom and environmental degradation, irrespective of whether it claims to promote sustainable development or not*” They called for a move away from the ‘Western liberal democratic values’ that underpinned Agenda 21. This is a sharp contrast to the sustainable development agenda which is often assigned to the neo-liberal values emerging from inter-governmental organisations of western countries. Nevertheless, UNEP/CIB (2002) challenged the international development agencies to change their ‘business as usual’ approach to development in the developing world that, they said, ignored and conflicted with local cultural and spiritual values.

At its most extreme these views illustrate the relevance of previous discussions in 4.1 on the diversity of purpose that might be included in the governance framework for the built environment sector. The following extract illustrates the importance of the previously discussed comparative approach to determining the likely purpose for our governance framework:

“ The way is simple. It does not mean exalting or restoring every bit of Africa’s social heritage.....Nor does it mean rejecting everything history has brought us from Europe and elsewhere; It means examining our real culture for permanent values which created the unity, stability, solidarity and cohesion of ancient societies.....and to add to this canon selected values, not just from Europebut from civilizations and cultures from all over the world.” Iba Der Thiam (in Falloux et al 1993) in UNEP/CIB, (2002).

In contrast, whilst CIB (1999) set out tough aspirations and challenges for construction sector stakeholders, it did not challenge any of the development processes that lay outside of the sector. In fact it generally recognized the importance of ‘industrialisation’ as a process through which countries were going and how their level of industrialisation affected what was relevant to them. This was much in line with the thinking of Redclift

(1987) and Maslow (1994), especially when related to human needs as satisfied by different levels of development.

Therefore, we might expect there to be a strong purpose defined in a governance framework which, on the evidence of both Agenda 21 documents (CIB 1999 and UNEP/CIB 2002), might vary from developed to developing country perspective. Another important factor affecting the defined purpose will be the way in which sustainable development is defined for the sector.

For example, the dominance of environmental and technical issues was noted in CIB (1999) and exemplified by the consistently used Kibert (1994) definition: *“The creation and responsible management of a healthy built environment based on resource efficiency and ecological principles.”* From this definition it would be reasonable to suggest that a purpose could be ‘to create and manage a healthy built environment’. Therefore, it is worth considering other factors that can influence the purpose of a governance framework for sustainable development in the built environment. There are several examples given in our two reference documents as follows:

CIB (1999) discussed the meaning of ‘sustainable development’ in different languages such as English, French and Finnish, where in French and Finnish ‘sustainability’ translated into ‘durable’ thus changing the likely purpose to ‘seeking durability of buildings and their components’. Another approach to defining the sustainable development agenda CIB (1999), and thus defining a purpose for the sector, was to identify categories of problems such as: Physical problems linked to the issues of resources; Biological problems linked to the life of mankind; and Sociological problems having socio-political, socio-economic and socio-cultural facets. CIB (1999) also summarised key elements of various national programmes as a means of defining what sustainable development might be. This included such objectives as: reducing the use of energy sources and depletion of mineral resources; conserving natural areas of biodiversity; and maintaining the quality of the built environment and management of an healthy indoor environment.

In each of these examples, a purpose can be derived from the need to overcome a problem or specific objective. Therefore, at one level, we have UNEP/CIB's (2002) call for the implementation of a new development model, thus suggesting a purpose for sustainable development that includes the implementation of new development models at the global scale. At another level CIB (1999) calls for very practical measures such as the reduction of energy use and depletion of mineral resources, and therefore in that case, the purpose for sustainable development could be, for example, to reduce energy use, reduce waste, etc. Both scales of purpose must be justified as worthy. Each reflect priorities and capabilities of different stakeholders and each represent a different scale, such as originally noted by Barrett et al (1999). Therefore, it appears we need to consider different purposes relating to different temporal and spatial scales.

Taking another look at a likely purpose for the whole sector, we should consider the hierarchy of definitions that appear in UNEP/CIB (2002). Whether because of the strong developing country perspective, or because the arguments had matured in the prevailing 3 years since CIB (1999) was published, UNEP/CIB (2002) presented a more holistic approach to the whole sustainable development agenda. It provided more sophisticated definitions that differentiated and helped clarify the often confusing terms of sustainability, sustainable development, urban sustainability, sustainable settlements and sustainable construction, each recognizing differences in temporal and spatial scales. Whilst the definitions are not under consideration in this investigation, the diversity of scale and influence is another illustration of how diverse the vision or purpose might be for our governance framework. For example, UNEP/CIB (2002) defines the following hierarchy:

- The overall objective of the sustainable development agenda is to sustain Homo Sapiens
- Sustainability is the condition or state which allows for the continued existence of Homo Sapiens, providing a safe, healthy and productive life in harmony with nature and local cultural and spiritual values.

- Sustainable Development is the kind of development needed to achieve the state of sustainability. A continuous process of maintaining a dynamic balance between the demands of people for equity, prosperity, quality of life and what is possible ecologically
- Sustainable human settlements are cities, towns, villages and communities that enable us to live in a manner that supports the state of sustainability and the principles of sustainable development.
- Urban sustainability is the broader process of creating sustainable human settlements especially towns and cities. It includes sustainable construction but also the creation of institutional, social and economic systems that support sustainable development (at the urban scale)
- Sustainable Construction is the result of principles of sustainable development being applied comprehensively to the construction cycle from extraction and beneficiation of raw materials through the planning design and construction of buildings and infrastructure until their final deconstruction and management of the resultant waste.

Whilst some of these positions could be challenged by various interest groups, for example the ‘deep greens’ could disagree with the dominance of Homo Sapiens, the descriptions provide a potential hierarchy of definitions and purposes suitable for different scales of activities in the built environment’s governance framework.

It was obvious from analysis carried out to construct the theoretical framework (4.1 above) that the complexity associated with defining the ‘Purpose’ component of the Governance Framework poses a special problem. This is also the case for the built environment sector and raises the questions:

1. Should we include for all eventualities, developing a multiple purpose? – this is not too helpful as the demand from practitioners is for a ‘common framework’

2. Does it require a single purpose for sustainable development to be developed by all stakeholders? - this seems an ideal solution but would require extensive consultation and seems unlikely within the timescale and resources of this project.
3. Do we need to include some kind of methodology that allows for the development of a purpose to be applied to different situations? – similar to the suggestion by Dror, (1994).

For practical purposes, and to enable this project to proceed within reasonable time lines, it was decided to combine the definitions contained in UNEP/CIB (2002) and define three Groups within the ‘Purpose’ component as follows:

Group 1: Sustainability or Sustainable Development, primarily a long-term objective, targeted at global or national scales

Group 2: Sustainable Settlements including Urban Sustainability, in which we could anticipate a range of actions to improve performance of the built environment and also the process of decision making for sustainable development

Group 3: Sustainable Construction, comprising a range of actions to bring about the transformation of the sector to include more sustainable management and business practices as well as improving the sustainability of the built environment.

In the case of Group 3, CIB (1999) and UNEP/CIB (2002) provide a further breakdown of likely purposes for the sustainable construction agenda including the purpose of:

1. Reducing environmental loads of building and construction works in regard to: production; operation; and decommissioning
2. Internalising sustainability by integrating the concept into sector thinking, decision making, and business practices
3. Mobilising resources for further knowledge development and research for technological and process changes.

4. Achieving profitability through sustainable construction reconciling: social and environmental impacts including the additional outset costs with reduced running costs.
5. Raising public awareness by promoting responsible behaviour for users of the built environment
6. Encouraging innovation in building materials and methods by recognizing that a new design paradigm is needed to invoke the innovation necessary to meet global concepts of 'Fair Shares' and Kyoto protocol
7. Improving Environmental health and safety by reducing impacts of materials that cause health and environmental problems to building occupants and building processes that threatens people's health and damages the environment
8. Introducing procurement procedures that create an enabling environment and market for sustainable construction products through procurement policies and procedures of large clients, including governments.

The detailed analysis of CIB (1999) and UNEP/CIB (2002) also reveals a range of additional 'Purposes' to be considered as Sub-Groups, as follows:

Under a collective heading of 'Dealing with existing problems' we can identify the following: Physical problems linked to the issues of resources; Biological problems linked to the life of mankind; and Sociological problems having socio-political, socio-economic and socio-cultural facets. These fit well into Group 1, Sustainability and Sustainable Development.

Under a collective heading of 'Improving management and organisation for sustainable development' we can identify the need to overcome significant barriers in: design processes; environmental quality of construction; re-engineering of the construction process; development of new building concepts; shortage of human resources; decision making processes; the owner's and client's demands; education for sustainable construction; public awareness of the issues; lack of research; inadequate standards and regulations. These fit well in Group 3, Sustainable Construction.

Under a collective heading of ‘Optimizing buildings and products performance for sustainable development’ we can identify the need to consider performance in terms of: different climatic conditions; different cultural and societal environments; different building traditions; different states of industrialization; and reduced embodied energy through life cycle analysis. These also fit well in Group3, Sustainable Construction

Under the heading of ‘Reducing use and consumption of resources’ we should consider: Energy saving measures; Reuse and recycling programmes; Reducing building material wastage; Increasing the use of recycled waste as building materials; Energy efficiency in buildings; Water conservation; Extending the durability and maintenance of components including: raw materials; whole buildings; estates and previously developed land. Whilst some of these issues could be applied at global, urban and local levels, the majority of issues apply to Group 3 Sustainable Construction

The source documents (CIB, 1999 and UNEP/CIB, 2002) also indicate the need to make special provision for the importance of the Habitat II agenda in defining the built environment sector’s impact on social, cultural and economic conditions in urban development. UNEP/CIB (2002) particularly raises the importance of urban sustainability in the sustainable development agenda of the built environment. These fit well in Group 2 Sustainable Settlements/Urban Sustainability.

The source documents used in this chapter (CIB, 1999 and UNEP/CIB, 2002) reveal therefore a range of ‘Purposes’ for which built environment stakeholders might strive; thus suggesting the relevance of the Purpose component of the theoretical governance framework developed in 4.1 above. Table 2 contains extracts from CIB (1999) and UNEP/CIB (2002) grouped together into Groups and sub-Groups of the Purpose component.

Table 2; Breakdown of contents of the PURPOSE Component of the theoretical governance framework.

COMPONENT 1: PURPOSE	
GROUPS	SUB GROUPS
Group 1: Sustainability or Sustainable Development, primarily a long-term objective, targeted at global or national scales	<ol style="list-style-type: none"> 1. Solving physical problems linked to the issues of resources 2. Solving biological problems linked to the life of mankind; 3. Solving sociological problems having socio-political, socio-economic and socio-cultural facets
Group 2: Sustainable Settlements including Urban Sustainability, in which we could anticipate a range of actions to improve performance of the built environment and also the process of decision making for sustainable development	<ol style="list-style-type: none"> 1. Achieving the objectives of Habitat II agenda in defining the built environment sector's impact on social, cultural and economic conditions in urban development
Group 3: Sustainable Construction, comprising a range of actions to bring about the transformation of the sector to include more sustainable management and business practices as well as improving the sustainability of the built environment	<ol style="list-style-type: none"> 1. Reducing environmental loads of building and construction works in regard to: production; operation; and decommissioning 2. Internalising sustainability by integrating the concept into sector thinking, decision making, and business practices 3. Mobilising resources for further knowledge development and research for technological and process changes. 4. Achieving profitability through sustainable construction reconciling: social and environmental impacts including the additional outset costs with reduced running costs. 5. Raising public awareness by promoting responsible behaviour for users of the built environment

	<ol style="list-style-type: none"> 6. Encouraging innovation in building materials and methods by recognizing that a new design paradigm is needed to invoke the innovation necessary to meet global concepts of 'Fair Shares' and Kyoto protocol 7. Improving Environmental health and safety by reducing impacts of materials that cause health and environmental problems to building occupants and building processes that threatens people's health and damages the environment 8. Introducing procurement procedures that create an enabling environment and market for sustainable construction products through procurement policies and procedures of large clients, including governments. 9. 'Improving management and organisation for sustainable development' we can identify the need to overcome significant barriers in: design processes; environmental quality of construction; re-engineering of the construction process; development of new building concepts; shortage of human resources; decision making processes; the owner's and client's demands; education for sustainable construction; public awareness of the issues; lack of research; inadequate standards and regulations. 10. 'Optimizing buildings and products performance for sustainable development' we can identify the need to consider performance in terms of: different climatic conditions; different cultural and societal environments; different building traditions; different states of industrialization; and reduced embodied energy through life cycle analysis 11. 'Reducing use and consumption of resources' we should consider: Energy saving measures; Reuse and recycling programmes; Reducing building material wastage; Increasing the use of recycled waste as building materials; Energy efficiency in buildings; Water conservation; Extending the durability and maintenance of components including: raw materials; whole buildings; estates and previously developed land
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4.2.3 The Stakeholders component for the built environment sector

CIB (1999) depicts 7 stakeholder groups and UNEP/CIB (2002) identifies 8 stakeholder groups also described as having a role in achieving sustainable development in the built environment sector. In the first case, this confirms the relevance of the Stakeholder component in the governance framework from both developed and developing country perspectives and, in the second case it demonstrates the need to consider the different roles and objectives that each stakeholder can achieve.

Analysis of the main stakeholder Groups follows:

Group 1: International institutions: This Group comprises organisations whose mandate is international in nature and whose authority is derived from outside a single nation state. It was recognised in both CIB (1999) and UNEP/CIB (2002) that international institutions can be governmental and non-governmental, regional or global. For example, Regional governments such as the European Union (EU) could be considered alongside inter-governmental organisations like United Nations (UN) including UN Habitat, UNDP, and UNEP as major policy makers and stakeholders. With other regional groupings such as the Economic Community of West African States (ECOWAS), New Partnership for African Development (NEPAD) and the African Union (AU) in the ascendancy a governance framework must include this tier of government stakeholder. However some regional variations occur. For example, the AU has not yet evolved to the same capacity as the EU to act as an effective policy maker or regulatory body. Currently, UN Habitat (UN General Assembly 2002) appears to be authorised to implement important development policies especially related to sustainable urban and community development in Africa and other developing regions particularly where there is no regional governmental body.

Analysis of the literature in Chapter 2, such as Collingwood (2002), revealed the influence of the World Bank and International Monetary Fund as critical international

stakeholders especially in their role with developing countries. UNEP/CIB (2002) also concluded that *'Many of the problems experienced in the developing world are a result of the development models these institutions encouraged the developing countries to follow'*.

Within CIB (1999) various international, sectoral organisations were identified as important influencers of policy and practice. These included the Construction Engineering Research Foundation (CERF); The International Union of Testing and Research Laboratories for Materials and Structures (RILEM); The International Energy Agency Implementing Agreement on Energy Conservation in Buildings and Community Systems (IEA ECBCS); The International Society for Indoor Air Quality and Climate (ISIAQ); The Committee of Local Environmental Initiatives (ICLEI); Council of International Contractors Associations (CICA); and CIB itself. These organisations represent a sample of the many international organisations representing different professional, commercial and trade interests from the built environment sector. Organisations like this provide an extension of national interest groups such as professional bodies and international groupings, like ICLEI (local authorities) and CIB (research institutions).

CIB (1999) prescribed various actions for this stakeholder group. All of the organisations in this category were seen to be important influencers of rules, standards and certification schemes for sustainability and eco-compatibility, setting and measuring performance standards including quality standards for reused and recycled materials. At the time they also prescribed that this stakeholder group could increase taxes on waste and emissions and incentivise the use of environmentally friendly materials. However, most of the measures prescribed for the international bodies were dependent on voluntary actions (see further discussion in next section). The ability to sanction legal or fiscal controls on construction activity, rests only with national, local or regional (ie EU) governments.

Group 2: National Governments: The role of National governments was clearly defined in both reference documents. For example, CIB (1999) identified the need for

national governments to develop clear national sustainability policies and plans and put measures in place that aimed to reduce major environmental impacts such as global warming, energy consumption etc. UNEP/CIB (2002) said that national governments should lead by example as both client and regulator, implementing regulations for sustainable development and setting up legal structures for performance monitoring and evaluation. In addition they prescribed a facilitative and enabling role including capacity building throughout the sector and government departments, thus concluding with the noted requirement in a global governance framework for maintaining equilibrium of capacity between stakeholders. UNEP/CIB (2002) prescribed an environment created by governments that enabled standards to be developed and applied by all stakeholders and constantly upgraded. They suggested that governments should also incentivise sustainable construction through tax breaks and preferential financial arrangements.

Group 3: Local Governments: When prescribing actions for government in UNEP/CIB (2002), local governments were not treated separately. However, their role was recognised in regulating local development, particularly in the urban environment and, in regard to developing countries, how problems with lack of resources and skills lead to poor governance and poor standards of development in the built environment.

Local government was seen to have an important role within CIB (1999) aimed at improving land use planning, and local government in general through the implementation of Agenda 21. Local Government was also seen as the main authority handling urbanisation and the importance of ensuring sustainable urban development was comprehensively described in both reference documents.

The importance of Local government, particularly in the case of developing countries, has been identified throughout the literature, where significant problems are caused by lack of local planning, enforcement and financing capacity.

Group 4: Investors, Developers, Clients, Owners, Users, maintenance organisations
From the outset CIB (1999) identified clients, owners, developers and investors as critical

players in driving the market for sustainable construction. Emphasis was also placed on this stakeholder group to set environmental targets and goals. The role of clients was also identified as critical in reducing energy consumption in buildings and also in setting performance targets in environmental management that could, for example, be emulated in the built environment sector. UNEP/CIB (2002) singled out Clients as a critical stakeholder group, extending the concept of products and standards leadership identified by CIB (1999), to include a range of measures that aimed to mainstream sustainability in building requirements. For example, there was an emphasis on a pro-active approach by clients and developers to learning about sustainable development, including building partnerships with other stakeholders such as government, local communities and research institutions to '*leverage change*' CIB (1999).

The stakeholders identified in this group form what has previously been described (Windborne et al 2001) as 'demand-side' stakeholders in that they create the demand for buildings and infrastructure that form the built environment.

Group 5: Contractors, Designers, Manufacturers and suppliers: Characteristic of the bottom-up approach taken in CIB (1999), there was a comprehensive set of roles set out for contractors, designers, manufacturers and suppliers primarily aimed at reducing the environmental impact of their operations and, with regard to designers, reducing the environmental impact of the buildings they designed. Similarly to Group 4 above, there was a strong requirement for co-operation and partnership with other stakeholders. In fact it was a major concern in CIB (1999) that closer collaboration should be encouraged between Groups 4 and 5 as described here, not only to develop new standards and learning but to implement practice on a daily basis. Contractors were seen to play an especially important supply chain role encouraging sub-contractors and suppliers to improve environmental performance.

All of these demands were repeated and consistently extended in UNEP/CIB (2002) when setting out the roles and actions for built environment practitioners. It was expected that supply-side stakeholders would enable organisational learning for sustainable

development, be involved in many partnerships and collaborative projects, target changes in their organisational processes and extend their concerns to include social responsibility in management and reporting.

The stakeholders identified in this group form what has previously been described (Windborne et al 2001) as ‘supply-side’ stakeholders in that they supply the demand for buildings and infrastructure that form the built environment.

Group 6: Education and research (Support services): Once again, characteristic of its bottom-up approach, CIB (1999) set out a wide range of measures for research and educational establishments based on existing actions and measures. Key themes were to: incorporate sustainability issues into training and education programmes, promote interdisciplinary working and training in general, provide more ‘user-friendly’ information and guidance based on methodologies in use around the world. A more sophisticated agenda was prescribed by UNEP/CIB (2002) reflecting on the need for research institutions to change and adapt themselves to respond better to the sustainable development agenda as well as taking an independent role in monitoring and evaluating performance throughout the sector.

Group 7: Non Governmental Organisations (NGO) and Civil Society Organisations (CSO): UNEP/CIB (2002) identified Citizens as an important stakeholder group with a role in changing behaviour such as reducing the use of resources. They also identified the NGOs and CSO’s representing various citizen interests as playing an important ‘watchdog’ role and this is in common with the role they are seen to play on behalf of civil society in both global and corporate governance agendas. As well as a watchdog role, it was suggested that they should partner with research institutions to help disseminate new technologies into different communities.

Group 8: Informal traders and their trade unions: Informal traders and their trade unions were identified by UNEP/CIB (2002) as a key stakeholder group in developing

countries. In fact they identified that a ‘huge proportion’ of both the population and small scale firms operated outside of the formal economy, and laws of the land.

Therefore, the reference documents CIB (1999) and UNEP/CIB (2002) identify eight Groups of stakeholders that should initially be included in the Stakeholder Component of the theoretical governance framework.

Table 3 contains the stakeholder groupings.

Table 3: Breakdown of contents of the STAKEHOLDER Component of the theoretical governance framework

STAKEHOLDER GROUP 1	SUB GROUPS
INTERNATIONAL ORGANISATIONS	<ol style="list-style-type: none"> 1. UN organisations including World Bank 2. Regional Governments such as the EU and AU 3. Sector research groupings 4. Sector trade bodies 5. Professional bodies 6. Global NGOs, CSOs 7. National Governments (and their development agencies) 8. International Corporations
STAKEHOLDER GROUP 2	SUB GROUPS
NATIONAL GOVERNMENTS	<ol style="list-style-type: none"> 1. Regulatory bodies 2. Departments and Agencies acting as clients to the built environment sector
STAKEHOLDER GROUP 3	SUB GROUPS
LOCAL GOVERNMENT	<ol style="list-style-type: none"> 1. Land use planners and regulators 2. Building Control 3. Policy and Governance

STAKEHOLDER GROUP 4	SUB GROUPS
SECTOR DEMAND-SIDE	<ol style="list-style-type: none"> 1. Investors, 2. Developers, 3. Clients, 4. Owners/asset managers 5. Users, 6. Maintenance/service provision organisations
STAKEHOLDER GROUP 5	SUB GROUPS
SECTOR SUPPLY-SIDE	<ol style="list-style-type: none"> 1. Contractors 2. Designers 3. Manufacturers 4. Suppliers
STAKEHOLDER GROUP 6	SUB GROUPS
EDUCATION AND RESEARCH	<ol style="list-style-type: none"> 1. Education and training establishments 2. Research Establishments
STAKEHOLDER GROUP 7	SUB GROUPS
NGOs and CSOs	<ol style="list-style-type: none"> 1. Environmental Groups 2. Policy analysis Groups 3. Community Groups

STAKEHOLDER GROUP 8	SUB GROUPS
Informal traders and their trade unions	<ol style="list-style-type: none"> 1. Informal traders 2. Trade Unions

4.2.4 The Key Drivers component for the built environment sector

In Section 4.1 above, Key Drivers was identified as the third of four components in the theoretical governance framework. There was no doubt in either of our reference documents (CIB, 1999 and UNEP/CIB 2002) that change was an important aspect of sustainable development. As well as noting the role of regulation as ‘the most basic tool’ the role of new performance based standards, building codes and certification schemes were also prescribed in CIB (1999).

CIB (1999) also presented a very strong emphasis on strategies for change. Without being prescriptive, but generally recognising that construction needed to change, it set out the current challenges of determining legal, economic, social and political matters including determining the responsibilities of the sector, its management and organisation together with a series of actions. This included critical areas to be addressed and the barriers that were likely to affect progress.

Based on the detailed exploration of strategies for change in CIB report 237 (1998), CIB (1999) set out the steps necessary to transform the construction sector from what was recognized as the dominant ‘defensive’ approach to one that embraced opportunities for environmental improvements, this they called ‘offensive’, to one that looked at the eco-efficiency of whole production systems, this they called ‘eco-efficiency’ on to one that took a new more holistic approach which they called ‘sustainability’.

UNEP/CIB (2002) didn’t set out a strategy for change in the same way as CIB (1999), although it did include in its future R & D agenda a series of ‘enablers’ that were considered necessary to bring about changes in what they called the technology, institutions and value-systems necessary for achieving sustainable development in the sector.

Therefore, whilst CIB (1999) talked about strategies for change and UNEP/CIB (2002) used the term ‘enablers’ both documents recognised the importance of, what we call here, ‘Key drivers’ as a critical component for achieving sustainable development, thus reinforcing the importance of Key Drivers as a component of the theoretical governance framework.

However, it was recognized in UNEP/CIB (2002), that sustainability was seen as a ‘nice-to-have’ addition to normal practice rather than a motivator, and thus not a driver, in its own right. They also concluded that sustainability was perceived to add costs thus eliminating the profit motive for various stakeholder groups (CIB, 2002). These conclusions suggest therefore that key internal drivers for change are missing and the sector will need to rely on external drivers to bring about the necessary change. This lack of internal drivers for change may indicate why UNEP/CIB (2002), described governance as only ‘*an external enabler*’ for sustainable development in the built environment sector.

As was noted in Section 4.1 above, a governance framework includes internal and external factors and, best governance practice, as espoused by organisations like OECD, World Bank, Novartis, etc., all require a balance between regulation (external) and voluntary (internal) measures. Therefore, whilst the relevance of Key Drivers is established there must be serious concern for the seeming lack of drivers for change that emanate from within the sector.

A wide range of measures are prescribed for different stakeholder groups each of which could become key drivers. However, the effectiveness of such measures as Key drivers is determined by the likelihood of their implementation by, and impact on, the key stakeholder groups identified for the built environment sector. For example, both CIB (1999) and UNEP/CIB (2002) prescribe a particularly wide range of voluntary measures, the effectiveness of which currently remains unsubstantiated throughout the sector.

The following analysis therefore considers, in the context of each of the 8 Stakeholder groups, identified in 4.2.3 above, the likely effect of each key driver in bringing about sustainable development in the built environment sector.

In the case of Stakeholder Group 1; International institutions: UNEP/CIB (2002) made no explicit recommendations for international institutions in regards to implementing key drivers. However, CIB (1999) placed large demands on international institutions for establishing key drivers for sustainable development which included the following range of actions:

- Introduce rules, standards and certification schemes for sustainability and eco-compatibility
- Use guidance (regulations, supervision and sanctions) to achieve environmental goals
- Set measurable performance standards for short and long term
- Incentivise the use of more environmentally friendly materials
- Control the construction activity making construction companies more socially responsible
- Increase taxes on waste and emissions
- Apply strict built quality standards to all new build and refurbishment projects

To assess the likelihood of implementation a look at the legal and regulatory framework for global governance reveals that the rules are actually quite simple. As we have seen previously, National governments are the main source of legal, regulatory and fiscal measures that populate the global governance framework. They also authorize the United Nations to work on their behalf and have, in the case of the European Union, ceded judicial and some executive powers to the regional parliament and executive. (Heywood 2002)

The UN has no fiscal role and its legal and regulatory power is based on, what might be called ‘acquiescent’ power as given by national governments rather than sovereignty determined and enforceable in law. The UN Charter laid down standards of international

conduct for members, which included the recognition of national sovereignty and the right to self-determination. As Heywood (2002) says that at its heart was a commitment to collective security which explains why the Security Council is the most significant UN body.

Whilst the general assembly can debate and pass resolutions, the decisions are recommendations rather than enforceable international law. There are numerous examples of UN resolutions that have been ignored by countries. The World Court (formerly the International Court of Justice) is the judicial arm of the UN but can only arbitrate on issues when member states choose to refer disputes to the court and only about one third of member states recognize its jurisdiction. International law as currently practiced through the UN appears to be enforceable only by those who choose to participate with no overriding sanctions or enforcement mechanisms. Some argue that international law is little more than a set of moral principles (Heywood 2002).

Also, we have already identified the activities of other UN agencies, such as UN Habitat and intergovernmental monetary institutions like the IMF, that play an important role in global governance. The IMF, through the conditionality of their loans to nation states, use fiscal measures to influence global governance and thus sustainable development (as measured against one set of values, at least) and Habitat through their promotion of social and participatory standards could be seen to be creating a driver for sustainable development at the urban, cities and settlements scale of society.

Despite the actions of these intergovernmental organizations, legal, regulatory and fiscal measures for global governance and subsequently sustainable development comprise a range of: National laws, regulations and fiscal measures; European Law (applicable only to EU member states); and lending criteria of Intergovernmental monetary institutions

Other policy related mechanisms which rely on the voluntary actions of national governments include: The UN Charter (applicable on a voluntary basis to member states); UN resolutions (decreed by the General Assembly) such as the Millennium Development

Goals (2000); Initiatives of the UN agencies such as the programmes of UN Habitat and the Global Compact; and The World Court (voluntary application based on international law, customs, treaties, etc)

Therefore, with the exception of rules and standards as may be set by regional governments such as the EU, the actions of the UN Security Council and requirements set out in projects funded by UN agencies such as Habitat, all of the measures prescribed for international institutions noted above will be voluntary in nature and thus require internal drivers (either expressed individually or collectively) to bring them about.

In the case of Stakeholder Group 2: National Governments: The role of National governments was clearly defined in both reference documents and CIB (1999) identified the need for national governments to develop clear national sustainability policies and plans and put measures in place that aimed to reduce major environmental impacts such as global warming, energy consumption etc. UNEP/CIB (2002) said that national governments should lead by example as client and regulator, implementing regulations for sustainable development and setting up legal structures for performance monitoring and evaluation.

UNEP/CIB (2002) prescribed several regulatory measures including a regulatory framework for sustainable construction that: identified the roles and responsibilities of stakeholders; included internal codes of conduct for professional and regulatory bodies; aligned with international agreements and frameworks; included standards and regulations to support the transition to sustainable construction; and set up legal structures for monitoring and evaluation. A comprehensive agenda indeed.

Whilst it may be reasonable to expect regulatory measures as prescribed above to be achievable with the necessary political will and ability to incorporate into existing judicial, executive and fiscal functions of government, their wide-spread acceptance should not be presumed. For example, problems can occur where the political will is missing and where governments lack resources to ensure enforcement. This is often the

case in developing countries. Likewise the ability to bring about compulsory professional education rests with the government but is only possible where those professional bodies are underpinned by law and this is not the case in many countries.

An area of governance that appears to be underutilised is the legal and regulatory base for corporate governance. Whilst pertaining to the roles and responsibilities of board directors it is established at national level through: Common law (where applicable); Company law; the Articles of Association of the company (or the forming legislation in the case of state owned enterprises); and National laws and regulations (environmental/investment/employment/etc). All of these measures are established by governments at a national level and therefore provide a practical mechanism for improving governance and subsequently sustainable development. National regulations determining stock market registration and company reporting are also increasingly influential in improving corporate governance performance. Therefore, governmental actions regarding corporate governance standards are important but seemingly under-utilised drivers for sustainable development with private sector interests throughout the sector.

National governments are also influential in creating a political, economic and social environment in which governance and subsequently sustainable development is possible. Best practice in corporate and global governance requires a balance between regulatory and voluntary measures and the facilitative and enabling role that government's can play was noted by King (2002) and Iskander (1999) as well as in reference documents. For example, UNEP/CIB (2002) saw the importance of governments in creating an environment '*that enabled standards to be developed and applied by all stakeholders and constantly upgraded*'. They suggested that governments should also incentivise sustainable construction through tax breaks and preferential financial arrangements.

Therefore, national governments are perhaps the most important creators of key drivers for sustainable development. These drivers are both 'direct' measures such as regulation (on the sector and on corporate governance), seemingly critical to the built environment

sector, and ‘indirect’ by creating an environment in which the necessary voluntary and market-based actions are enabled for all other stakeholders.

In the case of Stakeholder Group 3: Local Governments: Local governments are another tier of government with legitimacy to set and enforce regulations. As such they are able to ensure the effective cascading of national, and perhaps international, standards into local communities. They were not singled out in UNEP/CIB (2002) as having a distinct role but a range of measures was prescribed in CIB (1999). It was felt that local governments could stimulate sustainable development and renovation of existing buildings through the planning system. This appears to be a practical measure. However, the ability of local governments to enforce such standards is also in doubt. Ebohon (2000) in particular points out the lack of institutions and resources that lead to poor enforcement of such standards in developing countries.

In the case of Stakeholder Group 4: Investors, Developers, Clients, Owners, Users, maintenance organisations: Client groups are influential drivers of change where the ‘market’ concept is understood and encouraged. Both of our reference documents set out a wide range of measures for, what we can call, demand-side stakeholders. Common to all of these stakeholders is the need for a business case beyond the desire for sustainable development itself. Whilst other authors such as Windborne et al (2001) and SCTG (2001) have striven to build a business case, the conclusion drawn by UNEP/CIB (2002) was that sustainable development was perceived as a high cost ‘nice-to-have’ measure rather than a mainstream essential. The extensive range of voluntary actions prescribed in our reference documents appear to be somewhat incongruent with the values and culture of the sector and particularly the track record of these demand-side stakeholders.

However, the corporate governance framework provides a useful place to look for building the business case currently missing for this stakeholder group. For example, corporate governance includes performance benchmarks determined by stakeholders increasingly including economic, environmental and social targets. This has been evident when exploring, for example, the Corporate Social Responsibility (CSR) agenda, where

corporations have been exposed to a wider range of stakeholders and voluntary performance standards. As King (2002) pointed out, from a corporate governance perspective, directors are responsible and accountable for the performance of their organisation against all performance measures and increasingly, voluntary mechanisms like King (2002), Turnbull (1999) and GRI (2002) are providing the framework on which wider-ranging performance can be measured.

Therefore, as is evident from the literature, corporate governance provides a range of regulatory and voluntary measures against which to measure corporate performance. Whilst the majority of corporations aim to satisfy the basic legal requirements, some, as exemplified by GRI (2002) and CIRIA (2001), choose to pro-actively differentiate themselves by exceeding regulatory requirements to set new standards of corporate governance that embrace corporate accountability, CSR and corporate citizenship (PoWBLF 1996, 1998 and 2002).

It seems therefore, the many aspirational requirements set out in both CIB (1999) and UNEP/CIB (2002) for those creating the demand for buildings and infrastructure projects should be tailored to the requirements of their corporate governance framework for maximum effectiveness.

For example, CIB (1999) prescribes the setting of ‘*concrete environmental demands*’ and ‘*concrete goals for building maintenance*’. For Clients these will only be possible if environmental demands and maintenance are important factors to their own business operations and therefore a component of their own governance framework. If environmental factors are not part of the Client’s governance framework they will not be included in their requirement for buildings and thus any attempt to introduce environmental issues will be perceived as an expensive ‘nice-to-have’, as has already been noted. Likewise, the requirement for clients to ‘*Adopt mechanisms that will release funds for additional costs*’ UNEP/CIB (2002) will also fail unless grounded in their business strategy and thus included in their governance requirements.

In the case of Stakeholder Group 5: Contractors, Designers, Manufacturers and suppliers: So far the literature reveals few examples of Key Drivers from within the supply-side stakeholders of the sector. However, an extensive range of measures were prescribed for this stakeholder group in CIB (1999) and UNEP/CIB (2002). All of the key drivers identified in this category therefore require an internally motivated change in behaviour. For example, designers were required to, *‘Adopt a more integrated approach to design’* and were required to *‘optimise the design process with other professionals’*; manufacturers were required to *‘Feature environmental qualities and life cycle analysis in product information’*, *‘introduce a waste/product recycling service’* and *‘improve the organisation of the work’*; contractors were required to *‘Re-engineer construction processes to use standardised components’* and *‘See sustainable consciousness and environmental thinking as a factor in achieving competitiveness’*

What was not considered in either CIB (1999) or UNEP/CIB (2002) was where the drivers would come from to bring about the required action.

As already noted, many of the requirements set out in both reference documents rely upon a demand that is external and it must be concluded that the key drivers for sustainable development with supply-side stakeholders will largely be generated by other stakeholders, by the governance requirements affecting those stakeholders and by circumstances outside of the built environment sector. This conclusion appears to be in line with the conclusions drawn in CIB (1998) that the construction sector is largely defensive in its approach to change.

In the case of Stakeholder Group 6: Education and research (Support services): As might be expected from documents written predominantly for a research audience, both of our reference documents prescribed many actions for education and research organisations. Most of the prescriptions in CIB (1999) involved research and education organisations promoting certain disciplines such as training for *‘sustainable building*

principles’ and *‘speaking a common language*’. Others included direct actions such as facilitating inter-disciplinary design and disseminating environmental impact reviews.

In UNEP/CIB (2002), the measures prescribed for these organisations were generally more sophisticated and centred on their own performance. For example, as well as being required to revise existing curricula to include sustainability issues and generally expand their educational offering they were also required to ‘practice what is preached’ and provide independent monitoring to the private sector and government as well as introducing mechanisms for their own monitoring and evaluation.

Whilst all of these measures were conceived as additional drivers on the sector as a whole, in common with the supply-side stakeholders, they require a demand from users and commissioners of research and education for such measures to emerge. Therefore, without the requisite demand, research and education organisations would need to voluntarily develop these measures either ahead of, or in parallel with, the market for their services. Therefore, as key drivers these measures generally fall into the voluntary category.

In the case of Stakeholder Group 7: Non Governmental Organisations and Civil Society Organisations: were specifically identified in UNEP/CIB (2002) as playing a watchdog role and were therefore perceived as an external driver for change in the built environment sector. Interestingly, it was suggested that they should ‘partner with research organisations to develop and transfer new technologies and practices to communities’ and if this was extended to monitoring and evaluating sector performance, then the NGO may well create a demand for the independent evaluation and monitoring prescribed for Research and Education stakeholders noted above.

In the case of Stakeholder Group 8: Informal Traders and their trade unions: As has already been concluded, whilst seemingly outside of the control and influence of all formal measures, this group may be more influenced by traditional family governance structures. It is inevitable that small traders, including small scale contractors and self-

employed people in the built environment sector are directly regulated by their employing firms such as contractors. The values and approaches of Contractors are therefore an important driver for the informal groups they employ.

The relevance of Key Drivers to the process of change for sustainable development in the built environment sector is readily acknowledged in both reference documents. The importance of conditions that would bring about the required change is also recognized. However, whilst the importance of legal requirements was clear the majority of recommendations proposed in both CIB (1999) and UNEP/CIB (2002) rely on market-based measures and voluntary actions. CIB (1999) put a strong emphasis on the 'clients' to drive the demand for sustainable construction through their demands for environmental standards etc. UNEP/CIB (2002) made a strong argument for governments to set regulatory, and as client, procurement standards as well as identifying the role of clients *"To demand products and services that support sustainable construction"*. Some examples of this approach are evident in the literature, such as the UK government's 'Greening Government Initiative' and publications such as 'Achieving sustainability in construction procurement' (GCCP, 2000) and the latest procurement policy of the Olympic Development Agency (ODA 2006). Yet, as the wide ranging literature has demonstrated there are few examples (globally) of voluntary actions being taken throughout the sector which has been characterised by a 'defensive' approach (CIB, 1998) to change.

Therefore, the search for more effective drivers is essential and the corporate governance framework provides some useful alternatives. For example, corporate governance, as it pertains to the roles and responsibilities of board directors, is subject to: common law (where applicable); company law; articles of association of the company or other organization; and in the case of public corporations the enabling legislation; and national laws and regulations (environmental/investment/employment/etc). As King (2002) also pointed out, directors are responsible and accountable for the economic, environmental and social performance of their organisations. And we have seen in the literature how actions by Friends of the Earth (FOE, 2004) , for example, affect firms throughout the

built environment sector. Therefore, corporations in the sector are under increasing pressure to improve their social and environmental performance as determined by, often remote, stakeholders. Whilst this driver is still largely voluntary, it is evident that ‘market’ or ‘stakeholder’ pressures are building, such that directors of corporations feel compelled by their legal and fiduciary duties to take concrete action. With the advent of rising expectations of corporate governance and reporting, as expressed in King (2002), Turnbull (1999) and GRI (2002), there are increasing pressures on corporations to report more transparently on their overall performance.

Key drivers for informal groups, such as contracted and casual labour, are less clear although they are likely to be strongly influenced by traditional laws and family values which come from outside the Sector.

As a conclusion for the analysis of Key Drivers, six Groups have been selected for the theoretical governance framework and are set out in Table 4 below.

Table 4: Breakdown of contents of the KEY DRIVER Component of the theoretical governance framework

KEY DRIVER GROUP 1	SUB GROUPS
Policies of Government and Corporations - on the basis that they have the ultimate ‘authority’ and ‘mandate’ (within their respective spheres of influence) to implement measures that aim to satisfy policy objectives	<ol style="list-style-type: none"> 1. Government Policy 2. Corporate Policy (eg) on:
KEY DRIVER GROUP 2	SUB GROUPS
National Laws and regulations – on the basis that Governments have the ultimate mandate and authority to set and enforce actions through law including:	<ol style="list-style-type: none"> 1. National laws 2. Company Law 3. Investment, procurement and Finance laws 4. Planning, Building and Environmental regulations 5. Land ownership laws
KEY DRIVER GROUP 3	SUB GROUPS
Fiscal measures set by Government – on the basis that Government has the mandate and authority to set and implement fiscal policy including:	<ol style="list-style-type: none"> 1. Taxes 2. Grants and tax breaks for environmental /sustainability improvements

KEY DRIVER GROUP 4	SUB GROUPS
The Market – on the basis that clients and customers are the key stakeholder group for demanding a change in the quality of goods and services.	<ol style="list-style-type: none"> 1. Demand driven by the users and clients of buildings and infrastructure 2. Demand driven by culture and values of society
KEY DRIVER GROUP 5	SUB GROUPS
Professional, Technical and Sectoral performance standards and codes of practice – on the basis that standards provide a benchmark against which clients and customers can assess the quality and value of service provision.	<ol style="list-style-type: none"> 1. Published technical and professional codes and standards 2. Certification and accreditation schemes
KEY DRIVER GROUP 6	SUB GROUPS
Government Facilitation, enabling and enforcement – on the basis that Government, including local government, has the mandate and authority to encourage participation and engagement by all stakeholders	<ol style="list-style-type: none"> 1. Development and implementation of Policy objectives 2. Compliance with laws and regulations

4.2.5 The Capacity component for the built environment sector

Every organisation needs to have the capacity to satisfy its core functions and corporate objectives (Iskander et al 1999). As objectives change, an organisation carries out different functions and subsequently its capacity must change to meet those objectives.

As has been evident throughout this analysis, our built environment reference documents prescribed a wide range of actions for achieving sustainable development in the built environment sector. Generally, it was agreed that changes had to take place and, as noted in the previous sections, there were various drivers prescribed for different stakeholders that would help bring about that change. Both of our reference documents describe a massive capacity building agenda and it was noted by UNEP/CIB (2002) that these gaps in capacity were because sustainable construction as a holistic concept was, at that time, less than 10 years old. It was recognised that there was a wide ranging need to build capacity across the board including, for example: awareness raising amongst different stakeholder groups, understanding of sustainability (particularly for clients), internal capacity building for organisations to handle new management processes and develop appropriate policy and legislation.

It was also noted in UNEP/CIB (2002) that there were gaps in capacity to create the enabling environment which, broken down into technology, institutions and value systems enablers, gave rise to further extensive capacity building agenda.

Therefore, the relevance of Capacity as a component of the built environment's governance framework is in little doubt. Some indication of the full extent of this component can be derived from UNEP/CIB (2002) when describing the 'enabling' environment necessary to achieve sustainable development in the built environment sector. For example, the technology enablers identified by UNEP/CIB (2002) consisted of what they called: (i) equipment, (ii) software and (iii) know-how, and where they did not exist there was a need for capacity building. Similarly, UNEP/CIB (2002) also said

that in order for institutions to be 'enabled' they needed to: (i) understand and support sustainable development; (ii) include sustainable development in their policy, legislation and governance; (iii) develop capacity to implement sustainable development; and (iv) follow an integrated and precautionary approach. These requirements were further broken down into 5 categories in which capacity was needed: (i) Policy and strategy; (ii) education; (iii) financial mechanisms; (iv) regulation and legislation; (v) mechanisms for good governance. CIB/UNEP (2002) also identified the need for capacity that encouraged: (i) personal codes of conduct and personal responsibility; (ii) community behaviour that supports a shared ethical system and a common vision of sustainable development; and (iii) society to embrace change and difference and encourages and enables creativity and innovation. This latter group of capacity demands were certainly ambitious, going well outside the built environment domain and the likely influence of its key stakeholder groups. As referred by authors such as Gyeke (2000) and Hofstede (1991 & 2002), these capacities are directly related to the cultural characteristics of groups and as such therefore present a formidable challenge. As illustrated by other parts of this analysis, UNEP/CIB (2002) proposes cultural capacities that appear totally counter-culture to many stakeholders in the built environment sector.

As we see from reference to global and corporate governance literature, capacity affects individuals, organisations and whole systems. Cadbury and Iskander et al (1999) recognized that corporate governance does not take place in isolation, identifying, for example, the need for an effective legislative framework and environment in which organisations are enabled to achieve their own corporate governance. This is particularly evident in developing countries where the regulatory and institutional capacity is less likely to exist (Ebohon et al 1997, Ebohon et al 2002, GIMPA 2003, Gilham 2004).

Both CIB (1999) and UNEP/CIB (2002) documents have confirmed that the role of government is critical in implementing direct measures such as regulation and indirect measures such as creating the enabling environment. This message is repeated for the governance agenda and, in regard to creating an environment conducive to good national governance, also requires a balance to be maintained between government, civil society

and the private sector. This sort of capacity building has been the focus of public sector reform programmes in developing countries for over 20 years.

However, Capacity is also an issue for individuals within organisations. According to IIA/KPMG (2003) and as noted elsewhere, the board of directors is ultimately responsible for virtually every aspect of a company's activities. Directors and the Board therefore sit at the centre of the corporate governance framework and will sit at the centre of changes required for sustainable development. It is therefore useful to understand the extent of capacity building required for directors. For example: PAGVS (1999) and Adei et al (2003) say that the Board needs to have the capacity to carry out 3 main functions of: (i) Leadership and direction; (ii) Controlling; and (iii) Communicating.

In the case of **leadership and direction** this means the capacity to: Set out the Purpose, Mission, vision; Set Goals, strategy and policy; Set performance targets that are outcomes based; Ensure organizational integrity; Appoint CEO/Executive Management; Approve acquisitions, mergers and disposals; Review the organisation's technological needs; Manage stakeholder/shareholder perceptions and interests; Oversee corporate social and environmental responsibilities; Plan succession of the Board, employees and volunteers where appropriate paying attention to critical skills and positions in the organization

In the case of **controlling** this means the capacity to: Approve operational plans and establish performance criteria of executives; Approve HR policies that determine the terms and conditions of employment for staff, recruitment procedures, disciplinary measures and grievance procedures; approve budgets that reflect the organization's priorities and that are based on realistic assumptions (of revenues, costs, and other factors such as inflation); Approve annual reports, including financial, environmental, health and safety, and social impact statements; Ensure that effective internal controls are in place; Monitoring and evaluation of management performance; Establish monitoring and financial controls; Appoint auditors and ensure accountability, and probity; Manage forensic audits and risk.

In the case of **communicating** this means: Legal reporting and satisfying regulatory requirements; Accounting for stewardship of assets to shareholders; Communicating effectively with stakeholders (politicians, regulators, social groups etc.); Holding annual general meetings; Issuing prospectii to building corporate image.

The analysis demonstrates therefore that Capacity is a key component of performance improvement in the built environment sector at the level of organizations, sectoral and national level. Four Groups emerge from the analysis to form a breakdown of the Capacity component of our theoretical governance framework, they are presented in Table 5 below.

Table 5: Breakdown of contents of the CAPACITY Component of the theoretical governance framework

CAPACITY GROUPS	SUB GROUPS
CAPACITY GROUP 1 Cultural capacity to develop and encourage: (CIB/UNEP 2002)	1. A Society which embraces change and difference and encourages and enables creativity and innovation. 2. Community behaviour that supports a shared ethical system and a common vision of sustainable development; 3. Personal codes of conduct that encourage personal responsibility;
CAPACITY GROUP 2 Performance Management capacity based on (CIB/UNEP 2002):	1. Policy and strategy 2. Education 3. Financial mechanisms 4. Regulations and legislation 5. Mechanisms for good governance.
CAPACITY GROUP 3 Technology capacity including (CIB/UNEP 2002):	1. Equipment 2. Software 3. Know-how
CAPACITY GROUP 4 Personal skills for good governance (Adei et al 2003)	1. Leadership and direction 2. Controlling 3. Communicating

4.2.6 A review of differences between Developed and Developing country needs

On the evidence in Chapter 2 and the two reference documents (CIB, 1999 and UNEP/CIB, 2002) there are distinct differences between developed and developing countries. Therefore, before concluding the development of our theoretical governance framework it is important to consider the differences that may affect the contents and subsequent effectiveness of the framework in regard to both developed and developing country perspectives.

In regard to the **Purpose** component, differences in definitions, language and the scale of temporal and spatial considerations are all likely to generate different visions and purposes between stakeholder groups. UNEP/CIB (2002) and Ebohon (2000) noted that developing countries often lacked the governance institutions. However, UNEP/CIB pointed out that development as prescribed for developing countries including governance institutions had followed a western, industrialized approach and thus called for a new development model. Thus the purpose component is likely to be different for developed and developing country situations and the latter may well be seeking fundamental changes in how development is defined and delivered.

Whilst our analysis in Section 4.2 so far has identified a consistent set of **Stakeholders** for both developed and developing countries, UNEP/CIB (2002) highlighted the need to clarify roles and responsibilities of the institutions in regard to relationships between international development agencies and the recipient stakeholders in developing countries. This is particularly relevant to large infrastructure development projects subject to intergovernmental loans which are based on international standards and utilize international contractors and consultants.

It was UNEP/CIB (2002) that also highlighted the importance of small and informal operators as a key stakeholder group throughout the developing world and it seems likely that this group will receive greater attention in the developing countries.

In regard to the **Key drivers** component, it was highlighted by UNEP/CIB (2002) and Ebohon (2002) that the absence of government and private sector institutions presented a substantial barrier to implementing many of the principles of sustainable development. Furthermore, UNEP/CIB (2002) identified the problems of subjecting small and informal operators to any fiscal or policy disciplines. Reference to our earlier analysis (GIMPA 2003 and Gilham 2004) also identified that conflicts of interest between organisations and individuals were more likely to occur in developing countries thus suggesting that different drivers such as family or traditional values would be more effective in influencing this majority stakeholder group.

In regard to the **Capacity** component, the lack of institutional capacity has already been noted in regards to policy formulation, regulation and enforcement. This was confirmed by CIB (1999) and UNEP/CIB (2002), noting capacity shortfalls such as lack of skills and personnel, poor monitoring, corruption, lack of coordination, political will, and limited public awareness of the concept of sustainability. Whilst in CIB (1999) these deficiencies in capacity were referred to both developing and developed countries, it has become evident in the literature (UNEP/CIB, 2002, Ebohon 2002, Gilham 2004) that capacity deficiencies are more wide ranging and thus damaging in developing countries.

Therefore, in regards to the differences between developed and developing countries, we conclude that:

- The **Purpose** may be significantly different between developed and developing countries
- The relative importance and power of **stakeholder** groups is different between developed and developing countries
- The range of **key drivers** available in developing countries is consistently less than those available in developed countries
- The lack of **capacity** in developing countries of properly trained personnel, properly mandated and resourced organizations, institutional arrangements, and

mechanisms for stakeholder consultation; all seriously impact on their ability to respond to both governance and sustainability agendas.

4.2.7 The theoretical governance framework – conclusion

The theoretical governance framework was developed through an analysis of both corporate and global governance agendas (4.1), as described in the literature, followed by an analysis of the sustainable development agenda for the built environment sectors (4.2), described in CIB Agenda 21 (1999) and UNEP/CIB Agenda 21 for Developing Countries (2002).

The stages of development of the theoretical governance framework have been captured in: Diagram 7 Corporate Governance principles; Diagram 8 Corporate and Global governance principles; and Diagram 9 (below) requirements for sustainable development in the built environment sector.

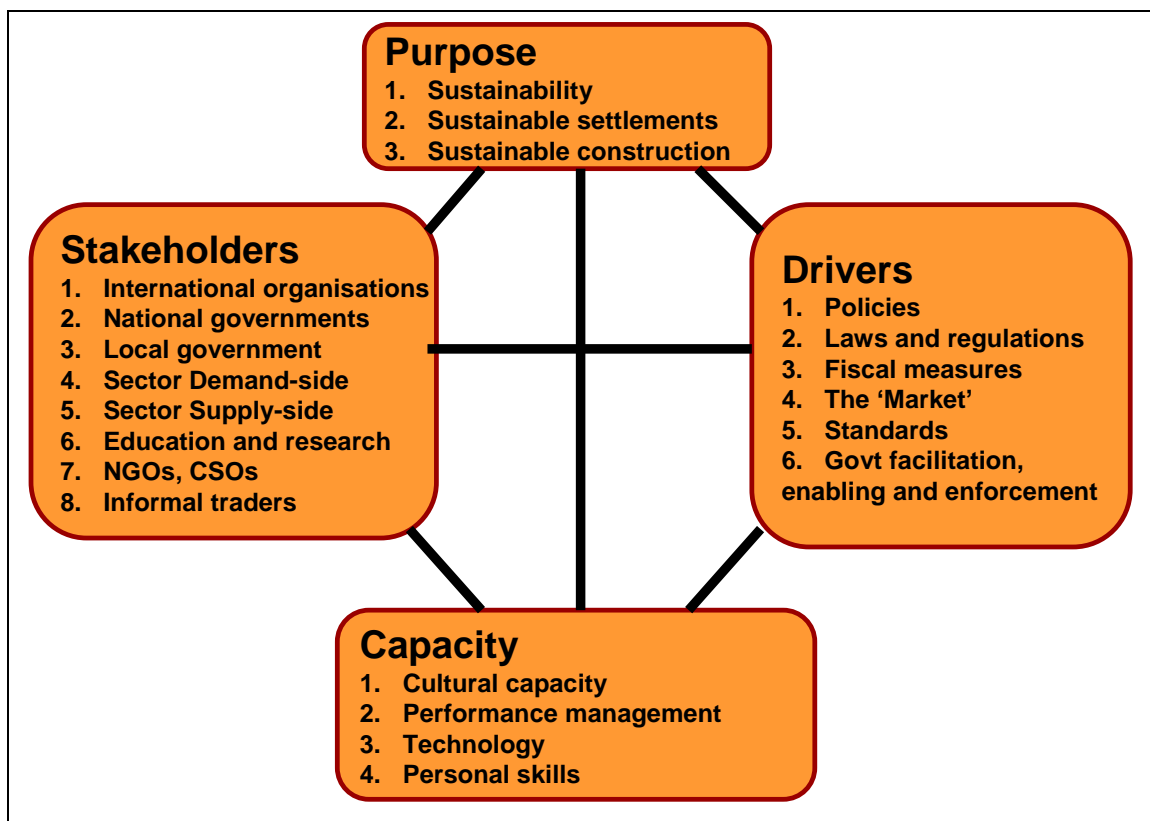
A brief discussion on key governance topics of ‘ethics’, ‘accountability’ and ‘transparency’ (4.1) predicted that ethics would be captured in the preferences of different stakeholder groups. This has emerged as predicted in the Groups and Sub-Groups identified in the analysis with interesting examples in the Purpose and Capacity Components. For example, Purpose Groups and Sub Groups include preferences for different scales and time horizons. Capacity Groups and Sub Groups include preferences for both ‘community’ behavior and ‘personal’ codes of conduct. The differences are starkly obvious in the comparison between Developed and Developing countries.

In section 4.1, accountability and transparency were considered outputs or desired states and thus not fundamental building blocks for governance. This has been reflected in the analysis of requirements for the built environment, neither emerged as a component in their own right.

Therefore the framework remains as originally constructed comprising four **Components of: Purpose, Stakeholders, Drivers and Capacity**. Contents of the **Groups and Sub Groups** have been extracted from the literature (CIB, 1999 and UNEP/CIB, 2002) and reflect the various requirements for sustainable development in the built environment including preferences of key stakeholders.

The theoretical governance framework presented in Diagram 9 (below) represents the achievement of Research Objective 2. It will form the basis of research to validate its global functionality and practical application in developed and developing countries.

Figure 9: The Theoretical Governance Framework; reflecting the requirements for sustainable development in the built environment sector of developed and developing countries



CHAPTER 5

Governance arrangements for sustainable development in the UK and Ghana

CHAPTER 5 contains a comparative analysis of arrangements, currently in place in the UK and Ghana, which govern the achievement of sustainable development in their respective built environment sectors. To provide a comprehensive assessment, the analysis considers the policies and regulations applicable to sustainable development (5.1) in the built environment sector as well as the environment in which they are formulated, implemented and enforced (5.2, 5.3, 5.4). The analysis concludes by identifying gaps in, and potential uses of, the governance framework in the chosen case studies as an indicator of the governance framework's global applicability (5.5). The output from this Chapter will contribute to Research Objectives 3 and 4 by testing the global application and relevance of the theoretical framework to policy makers and practitioners in a developed and developing country.

5.1 Policies and Regulations for sustainable development

5.1.1 The UK Case study

The UK is well endowed with policies, strategies and legal instruments that support sustainable development. Within the UK's overall sustainable development strategy (UKGOV, 2005) there are 4 priority areas: Sustainable Consumption and Production; Climate Change and Energy; Natural Resource Protection and Environmental Enhancement; Sustainable Communities. Within the overall SD policy framework, there is a wide range of policies, strategies, legal instruments and fiscal measures that address cross-cutting themes, and impact on built environment stakeholders in various ways.

The UK's SD strategy (UKGOV, 2005) was a second generation strategy emerging from a comprehensive review of the previous strategy 'A better quality of life' (UKGOV, 1999). The strategy has been developed within a strategic framework to include: 1) a shared understanding of sustainable development; 2) a vision of what is to be achieved and guiding principles; 3) priorities for UK action at home and internationally; and 4) indicators to monitor progress (UKGOV, 2005). In recognition of the devolution of government taking place in the UK, the strategic framework includes the UK Government Strategy, the Welsh Assembly Action Plan, the Scottish Executive Strategy and the Northern Ireland Strategy.

The influence of a National Framework approach is far reaching. For example, National SD objectives are evident in a range of policies, strategies and objectives, such as those of: (i) Government ministries, departments and agencies, including the Department for Transport (UKGOV, 2004), Environment Agency (EA, 2002) Olympic Delivery Authority (ODA, 2006); (ii) Regional development agencies such as the South East England Development Agency (SEEDA); Local government such as Hampshire County Council (HCC, 2006), and Eastleigh Borough Council (EBC, 2005). Many professional bodies and non-governmental bodies have their own policies which relate to the National objectives.

The UK's SD strategy (UKGOV, 2005) reflects the downward pressures of EU directives on key SD topics such as environmental management, sustainable consumption and governance. It also states that it includes consideration of how international SD objectives can be achieved to satisfy the Millennium Development Goals, The Doha Development Agenda of World Trade Organisations, The Monterrey Consensus on Financing for Development and the Plan of Implementation of the 2002 World Summit on Sustainable Development. The UK's SD strategy (UKGOV, 2005) therefore reflects the Government's priorities for international development support thus having an impact far wider than the UK itself.

When it comes to the built environment sector, there is a complex and continuously developing portfolio of policies, strategies, legal and fiscal instruments aimed at bringing about sustainable development in the built environment and enabling the sector to contribute to the national SD goals. The foremost of these is the dedicated Sustainable Construction Strategy called '*Building a better Quality of Life*' (UKGOV 1999) and a Review of Sustainable Construction (UKGOV 2006) aiming to update the sustainable construction strategy. As stated in the recently updated Planning Policy Statement 1, "*Sustainable development is the core principle underpinning planning*". Development Agencies are tasked with promoting sustainable development and are building requirements into procurement processes, for example requirements to meet Eco Homes or BREEAM rating targets. Also, as set out in Planning Policy Guidance note 13 (UKGOV, 2001), transport infrastructure and services are required to be integrated in local development plans. The Department for Transport (DFT) unveiled The Future of Transport, (UKGOV, 2004) a White Paper looking at the factors affecting travel and transport over the next thirty years. Its relevance to sustainable development is that its objective is to create a '*modern, efficient and sustainable transport system backed up by sustained high levels of investment over the next 15 years*'

The Department of Environment, Food and Rural Affairs (DEFRA) published the UK Waste Strategy (UKGOV 2000b) emphasizing the need to reduce landfill of industrial and commercial waste. The Department of Trade and Industry (DTI) introduced the

Energy White Paper (UKGOV 2003) setting out energy consumption targets, reduction of CO₂ and the increasing commitment to renewable energy.

Other practical measures include various taxes such as the landfill tax, aggregates levy, climate change levy, stamp duty exemption for deprived areas, which have all been introduced to provide economic incentives.

The UK also has a well developed regulatory framework including several pieces of legislation that apply to sustainable development and the built environment originating from both the UK and EU, for example:

The Buildings Act 1984 is the enabling Act under which the Building Regulations have been made require the conservation of fuel and power and the provision of access for the disabled. Updates to the Building Regulations include The Sustainable and Secure Buildings Bill. This Act has enabled Building Regulations to address sustainability issues more fully, aiming to protect and enhance the environment, facilitate sustainable development, and further the prevention and detection of crime. The Act also gives new powers to improve the sustainability of buildings, including: (i) Energy conservation; (ii) water, preventing waste, undue consumption, misuse or contamination; (iii) biodiversity, furthering the protection or enhancement of the environment; Demolition of buildings through consideration of building lifecycle. Another key change is the imposition of sustainability requirements on existing buildings at the time they are altered, extended or where there is a change of occupancy. This captures a wide range of building types and sizes including domestic buildings that have often escaped attention. For example, they require existing lofts and cavity walls to be insulated where cost-effective and they require inspection and monitoring of performance in use, e.g. boiler efficiency checks etc.

There are also updates to Part L of the building regulations which came into force in December 2005. Part L sets standards aimed at achieving a 20-25% saving in CO₂ emissions compared to current regulations. Existing methods of demonstrating compliance are to be replaced by a calculation of overall CO₂ emissions and comparison

against a target value. This calculation will also take into account any renewable sources of power used in the building.

The Planning and Compulsory Purchase Act came into force in July 2004 and has created wide-ranging changes to the planning policy framework. As a result of this act and other influences such as the European Commission's Strategic Environmental Assessment Directive, the following broad changes have occurred. For example: (i) at the strategic national level Planning Policy Guides will be replaced by Planning Policy Statements; (ii) at the regional spatial level Regional Planning Guidance will be replaced by Regional Spatial Strategies with a particular emphasis on employment and transport strategies; (iii) at the local level, Local plans, unitary development plans and structure plans are to be replaced by Local Development Frameworks that will be supported by Local Development Documents, see Office of the Deputy Prime Minister (ODPM) Planning Policy Statement 12; and (iv) at the site specific level, issues that would previously have been dealt with by Supplementary Planning Guidance will now be addressed through Supplementary Planning Documents or by Area Action Plans.

Under the European Directive on Strategic Environmental Assessment and the UK's Planning and Compulsory Purchase Act, it is now a requirement for a sustainability appraisal to be carried out as part of the development of Regional Spatial Strategies, and Local Development Documents.

The overall aim of the reforms described above is to ensure that national, regional and local objectives relating to sustainability are being effectively coordinated and implemented; adding pressure for development proposals to address sustainable development issues.

The Construction Products Directive (CPD) 89/106/EEC, implemented in the UK by the Construction Products Regulations, is one of the 'New Approach' Directives (European Community laws) to create a single European market by removing technical barriers to trade between Member States. Products meeting the essential requirements of the relevant

Directive(s) are eligible for 'CE marking' and may be placed on the market anywhere within the European Economic Area (EEA). Under the CPD, CE marking is achieved by complying with the relevant technical specifications and the CPD applies to any construction product, which is produced for incorporation in a permanent manner in construction works including both building and civil engineering works.

The Energy Performance of Buildings Directive came into force in January 2006. It requires the: (i) Establishment of a common methodology for calculating the integrated energy performance of buildings; (ii) Application of minimum standards on the energy performance to new buildings and to certain existing buildings when they are renovated; (iii) Energy certification schemes for new and existing buildings; (iv) Public display of energy performance certificates and recommended indoor temperature and other relevant climatic factors in public buildings and buildings frequented by the public; and (v) Specific inspection and assessment of boilers and heating / cooling installations.

Furthermore the requirement for an energy performance certificate to be provided when a building is built sold or rented out is likely to have a key influence on reducing energy consumption in buildings as it potentially allows the introduction of further legislation that could create a market value for buildings with reduced energy demand.

In the case of infrastructure, the Transport Act 2000 requires most local transport authorities (county councils, unitary authorities and partnerships in metropolitan areas) in England (not London) to produce and maintain a Local Transport Plan (LTP). Passenger Transport Executives (PTEs) cover the English metropolitan areas (Greater Manchester, Merseyside, South Yorkshire, Tyne and Wear, West Midlands and West Yorkshire) and produce a plan in partnership with the local district councils. An LTP sets out the authority's local transport strategies and policies, together with an implementation programme. The first five-year LTPs were submitted in 2000, covering the period from 2001 to 2006. Authorities have reported each year on their delivery of policies and programmes in Annual Progress Reports (APRs) and are expected to report on the delivery of their transport strategy during the five years of the first LTP period.

In summary therefore, we conclude that there is a well developed yet evolving, integrated policy and legal framework for sustainable development incrementally affecting the UK's built environment sector.

5.1.2 The Ghana Case Study

Ghana's policy framework has emerged within a Comprehensive Development Framework (CDF) established by the World Bank (WB, 1999). The CDF takes an holistic approach to development, seeking a better balance in policymaking by highlighting the interdependence of elements of development such as social, structural, human, governance, environmental, economic, and financial issues. It emphasizes partnerships among governments, donors, civil society, the private sector, and other development actors. Whilst the CDF has been established with international agencies, it is stated that the CDF approach aims to put the country in the lead, both "owning" and directing the country's development agenda, in which the World Bank and other development partners can define their support for their respective plans.

A key aspect of the CDF approach has been the selection of a number of "pilot" countries including Ghana. The Lead Ministry in Ghana for CDF activities is the Ministry of Finance and Economic Planning indicating the economic orientation of the framework and emphasis on development in Ghana.

Ghana's CDF sets out objectives in the areas of: Roads and Transport; Water; Energy; Private Sector Development; Decentralization; Natural Resources; Governance and Anti-Corruption; Financial Sector; Agriculture; Education; Health; Urban Development; Legal Reform; and Poverty Reduction.

Whilst initially a tool to comply with the CDF principle and therefore leverage significant donor funding, Ghana's poverty reduction strategy (ROG, 2001), acknowledged in the UN Sustainable Development Ghana Country Report (UNSD, 2002) as Ghana's national Sustainable Development Strategy, has now evolved as a second generation strategy

document to become a ‘Growth and Poverty Reduction Strategy’ (ROG, 2005c), aiming to set out a *‘coordinated programme for the economic and social development of Ghana’*.

As is evidenced by the priorities in GPRS II (ROG, 2005c) and annual budget statements (ROG, 2005b and 2006d), Sustainable Development in Ghana is defined as ‘Economic Growth and Poverty Reduction’ including the achievement of Ghana’s Millennium Development Goals (MDGs). GPRS II also dictates the annual priorities for allocating Government and Development Partner resources therefore, as noted in Chapter 2, determines the main SD agenda for Ghana.

Various sectoral policies have emerged under the umbrella of GPRS II, such as Agriculture, Trade and Industry, Health, Education, Private Sector Development and Public Sector Reform. Others are emerging that impact directly on the built environment sector including Urban Development (WB, 2006), Energy (ROG, 2006a), Urban Transport (ROG, 2006b) and National Transport (ROG, 2006c).

Embedded in the Constitution (ROG, 1992) and reflected in the Common Development Framework, decentralization is a key policy aimed at creating local government (Metropolitan, Municipal and District Assemblies, MMDAs) as the primary decision making bodies for development planning and control and infrastructure development and maintenance. Through requirements on MMDAs, the Regional Coordinating Councils, the National Development Planning Commission (NDPC) and the Ministry of Local Government, Rural Development and Environment (MLGRDE), development plans, should at least in theory, be coordinated with national development objectives. The local authorities are the primary bodies responsible for enforcing building regulations and development plans.

The National Environmental Action Plan (ROG, 1991), sometimes referred to as the Ghana Environmental Action Plan, is lauded as a major initiative to put environmental issues on the priority agenda. Ghana’s environmental policy is obscurely contained within the NEAP (ROG, 1991) in which it sets out the objectives as follows: (i) to

maintain ecosystems and ecological processes; (ii) Ensure sound management of natural resources and the environment; (iii) adequately protect humans, animals and plants, their biological communities and habitat; (iv) guide development in accordance with requirements to prevent, reduce and as far as possible eliminate pollution and nuisances; (vi) integrate environmental considerations in sectoral structural and socio-economic planning at national, regional, district and grass-roots levels; and (vii) seek common solutions to environmental problems in West Africa, Africa and the world at large.

The main outcome of the NEAP from 1991 to 2000 was the establishment of the Environmental Impact Assessment system, set out in Ghana's environmental assessment procedures (ROG, 1995), Environmental assessment regulations Legal Instrument 1652 (ROG, 1999) and Legal Instrument 1703 (ROG, 1999b).

There is a primary requirement for all significant development projects to undergo an Environmental Impact Assessment (EIA) and more recently the Government has committed to implementing a Strategic Environmental Assessment (SEA) for all new policies, strategies and programmes. Project briefs for infrastructure projects funded by Development Partners include the requirement for environmental and social impacts to be assessed and mitigation measures applied. This external pressure has encouraged the development of two important framework documents for the implementation of environmental and social management (ROG 2007) and resettlement (ROG 2006e) principles in the road sector. The latter will contribute to the concern for compensating people, including informal settlers, displaced by such projects.

Currently, there are no policies or strategies that are specifically aimed at achieving SD in the Built environment sector. There are a limited number of developments that are hoped to bring about better use of government resources for infrastructure development and encourage a higher level of private sector involvement in built environment development activities such as the emergence of the National Transport Policy (Nathan 2006, ROG 2006c, ROG 2009) and proposed Integrated Transport Plan (EU, 2006). It is hoped that both outputs will play a significant role in defining priorities and objectives in the

Transport sector to serve the national sustainable development objectives and both documents will have a significant impact on stakeholders throughout the built environment sector in Ghana.

The Government's objective to apply strategic environmental assessments to major policy documents has meant that the National Transport Policy draft white paper (ROG, 2006c) has already undergone such an assessment by Ghana's Environmental Protection Agency (EPA).

However, there is currently no overriding policy concerned with housing or human settlements. UN Habitat is currently funding the development of a new policy which commenced in 2005 and is currently in pre Green Paper consultations. The current draft policy is not publicly available but a recent discussion (January 2007) with Prof Mills-Tettey, Registrar of the Ghana Registration Council, revealed that UN Habitat had highlighted shortcomings in governance and environmental issues. The lack of policies on human settlements and housing indicates a major gap in the governance framework for sustainable development in Ghana. It is hoped that the long-promised National Housing Policy will plug that gap, provide guidelines on housing for poverty alleviation and contribute to Ghana's spatial development agenda.

There is currently no Land Use planning policy or National Development Plan that considers spatial planning issues. Some local authorities develop the required Land Use Development Plans as part of their development planning function but many are woefully out of date. Accra, the capital city of Ghana for example, has a plan dating back to 1991. The Accra Metropolitan Authority has been completely ineffectual in enforcing development control within that plan. For example, an area of Accra known as Osu was described in the Plan as an area reserved for high quality residential development. Osu is now one of the fastest growing commercial centres in Accra, providing an alternative to the traditional town centre area of old Accra.

In the latter part of 2007 the National Development Planning Council commenced consultations to prepare the draft National Development Plan (ROG, 2008) as the successor to Ghana's Poverty Reduction Strategy II (ROG, 2005c), yet this still has no spatial master planning component. Various Town and Country Planning documents also set out requirements for the local authorities regarding the development processes, for example GCS (2003).

The Built Environment sector is also significant in terms of generating a sustainable economy. Whilst the sector accounts for only 3% of Ghana's GDP it accounts for approximately 20% of its Manufacturing capacity (Nico Annan, 2004). The strategic importance of transport infrastructure is highlighted in the GPRS II as an enabler for economic growth and poverty reduction, serving other sectors; including private sector development, growth of the agriculture industry, international trade, etc. The construction and maintenance of Ghana's transport infrastructure is a significant component of the built environment sector as evidenced by the expenditure targets for the Ministry of Transportation in the Government's annual budgets (ROG 2005b and 2006d). It is also thought that a large percentage of inward investment for the Ghanaian diaspora ends up in private housing developments.

Ghana's building regulations (ROG, 1996) are based on UK building regulations. There are no provisions for environmental design or performance of buildings. There are no labeling schemes such as BREEAM in the UK or Green Buildings for Africa in South Africa although there is an embryonic energy labeling programme promoted by the Ghana Standards Board, the Energy Foundation and the Energy Commission. The current state of Land use planning and land ownership laws are of concern. There are over 15,000 land disputes outstanding in Ghana's courts caused by overlapping layers of ownership rights. The Land Administration Process is currently under review (the LAP project) by the Ministry of Local Government (MLGRDE) aiming to bring about better coordination between all agencies involved in land administration, development and planning. Land ownership and the effective registering of title is critical to economic development in Ghana.

5.2 The Policy making environment

5.2.1 The UK Case study

The UK Government has taken a strong lead on SD policy formulation. Through consultation and engagement it has created a multi-stakeholder environment in which SD policy is pro-actively developed and implemented. Roles and responsibilities are clearly defined and there are a range of legislative and fiscal instruments in place to support policy implementation.

For example, in the case of Central Government, UK government has adapted the roles and responsibilities of its Ministries as the national SD priorities have evolved. Currently, the lead Ministries and their main areas of responsibility for SD in the BE are the: Department of Environment Foods and Rural Affairs (DEFRA) with overall responsibility for sustainable development, environmental and biodiversity issues; Department of Trade and Industry (DTI) with responsibility for Energy - including renewable energy, Construction and other industries; Department of Communities and Local government (DCLG ODPM) primarily responsible for Planning and development with a strong emphasis on creating sustainable communities; The Department for Transport's (DfT) role is to determine overall transport strategy and to manage relationships with the agencies responsible for the delivery of that vision. Its objective is to oversee the delivery of a reliable, safe and secure transport system that responds efficiently to the needs of individuals and business whilst safeguarding the environment.

The UK sustainable development strategy (UKGOV, 2005) requires all departments to produce a sustainable development action plan. The DfT, for example, produced its first Sustainable Development Action Plan in January 2006 setting out its policy and operational commitments and relating those commitments to the national SD objectives. The DfT's Action Plan supersedes their previous sustainable development policy statement and includes key examples of departmental commitments to sustainable development, ranging from departmental strategic policy to estates management and

recycling. The DfT sets out its commitment to adhere to the shared principles, set out in the UK SD strategy.

In the case of regional government and local government, whilst local government has always had a strong role to play in development, a regionalized structure comprising 9 regions and devolved assemblies in Wales, Scotland and Northern Ireland has emerged over the last few years. SD policy and implementation is embedded in the regionalized structure as follows.

The Government established Regional Development Agencies (RDAs) as the strategic drivers of sustainable economic development; aiming to have an influential role in the business community in the English regions. The philosophy underpinning the dominant role of Regions in SD policy and implementation is that *‘the regions are best placed to determine the high-level strategy arrangements they think are most appropriate and that Regional Assemblies should continue to take a lead with partners in establishing these arrangements.’*(UKGOV 2006)

Regional Assemblies have a statutory duty to prepare Regional Spatial Strategies and scrutinise the work of RDAs. They also play a leading role in work on integrating regional strategies and drawing up Regional Sustainable Development Frameworks (RSDFs) with key players and a wide range of regional expert groups and stakeholders.

The RDAs have a statutory duty to contribute to sustainable development in the UK and prepare Regional Economic Strategies (RES). RDAs carry out both regional policy formulation and implementation functions.

London, the UK’s capital city, has different governance arrangements and has the Greater London Authority which is made up of a directly elected Mayor and a separately elected Assembly. The GLA has developed an extensive SD policy framework setting SD implementation standards for London Boroughs, government agencies operating on

behalf of London (for example the Olympic Development Authority and Transport for London) and London-based businesses.

Regional Sustainable Development Frameworks (RSDFs), Integrated Regional Strategies (IRS) and Integrated Regional Frameworks (IRF) set out regional policies on sustainable development. Regional Assemblies and other regional partners are expected to take into account the UK Sustainable Development Strategy in their high-level regional strategies.

Implementation strategies and Local Area Agreements are further encouraged at sub-regions, city-regions and local Sustainable Community levels, all aiming to contribute to national and regional sustainable development priorities. Local Authorities are also likely to have their own policies on specific issues relevant to Sustainable Development and sustainable construction in the areas of housing, transport, waste, water, biodiversity, fuel poverty and CO2 emissions. For example, the transport plans for Hampshire County Council (HCC, 2006) and Eastleigh Borough Council (EBC, 2006) illustrate the integrated nature of transport planning within a regional and local sustainable development agenda.

Other bodies are involved in developing and coordinating Sustainable Development Policy from National level to policies affecting the Built Environment.

In the case of non-governmental bodies, there are many well respected and influential Non-Governmental Organisations in the UK. Many, such as World Wild Life Fund and Friends of the Earth, are actively involved in policy formulation specific to both Sustainable Development and the Built Environment.

The Sustainable Development Commission is the Government's independent advisory body on sustainable development. It reports to the Prime Minister and the First Ministers of the devolved administrations of Wales, Scotland and Northern Ireland. The SDC is chaired by Jonathon Porritt, a well known environmentalist, with commissioners drawn from academia and the private, public and not for profit sectors. It carries out independent

reviews and critical analyses of how SD policies are both formulated and implemented throughout the UK, for example, its independent review of sustainable development in the English Regions (SDC, 2005).

In the case of the Private Sector, the UK benefits from a well established private sector. Working within development planning guidelines set by central and local government. Private sector developers and investors pursue their own corporate objectives within these guidelines and therefore contribute to the UK built environment sector policy

Representation in policy formulation from the private sector is also achieved through various groups and bodies for example: The Sustainable Buildings Task Group was set up by the Deputy Prime Minister to identify specific cost-effective improvements in the quality and environmental performance of buildings including actions that Government could take to facilitate faster progress towards SD in the built environment sector. The Group reported its findings (SBTG 2004); The Egan Review - Skills for Sustainable Communities (2003) was undertaken at the request of the Deputy Prime Minister in order to review the skills and training required by built environment professionals required in order to deliver the Government's 'sustainable communities programme.

In the case of professional, educational and research bodies, there are many mechanisms through which built environment professionals are represented in the policy formulation process. For example: Policy documents are circulated to these professional bodies for comments and review; Most of the built environment professional bodies have some sort of sustainability statement or policy and produce guidance material such as the CIOB's guidance on Social Responsibility for construction firms (CIOB, 2003); Universities and research bodies play an important role in policy formulation. Through its research funding programmes, Government involves a wide range of researchers in policy formulation activities. National bodies such as the Building Research Establishment and Transport Research Laboratory, have specific roles in developing regulations, safety standards and guidance material for the built environment although

both organizations are now independent of Government being regulated by their respective Boards and, in the case of BRE, by a foundation membership.

5.2.2 The Ghana case study

Government, with its key development partners, has taken the lead in developing national-level policy for sustainable development although, as described in 5.1.2 the emphasis is on growth and poverty reduction. This is largely as described in the Ghana poverty reduction strategy II (ROG, 2005c). Whilst environmental sustainability is included in some national development objectives, there is less evidence of its effective integration into the Government's current policy framework. For example, Ghana's environment policy dates back to the National Environmental Action Plan published in 1991.

In the case of central Government, Ghana's policy framework has evolved from a sector-based approach to a coordinated nation-wide approach as set out in Ghana's poverty reduction strategy (ROG 2001 and 2005c) and the National Transport Policy (ROG, 2006c and 2009). The National Transport Policy has also paid attention to the institutional and functional requirements needed to implement policy and has included strategies for wide ranging institutional reform and capacity building. Annual reviews of the road sector development programme (ROG, 2005a) and other wide-ranging studies for Government, for example Sam et al (2005), WSP (2006), Gilham et al (2007) and the Ministry of Transportations own institutional reform working Group (ROG, 2007b), identify that the lack of functionality hampers the development and enforcement of policies, plans and regulations that determine even basic standards of development let alone the more demanding performance standards for sustainable development.

There remains no single ministry or department responsible for Ghana's overall sustainable development and likewise no single ministry responsible for the built environment sector. Several Government bodies play a significant role in policy making for sustainable development: (i) Ministry of Finance and Economic Planning (MOFEP) – as defined under the Common Development Framework approach The MOFEP is seen as

the lead Ministry for growth and poverty reduction in Ghana and budget allocations are based on achieving the strategic objectives set out in GPRS II; (ii) The National Development Planning Commission (NDPC) is responsible for coordinating overall development plans in Ghana. The NDPC works closely with the MOFEP and the MOLGRDE in coordinating regional development plans and has been responsible for developing Ghana's growth and poverty reduction strategies (GPRS I and II); (iii) The Ministry of Local Government, Rural Development and Environment (MLGRDE) – is responsible for implementing the decentralization policy of Government including oversight of the land use planning, development planning and budgeting process. Through the Regional Coordinating Councils and Regional Ministers, the MLGRDE is notionally responsible for the performance of local governments. It has recently taken on board responsibility for environmental issues although it is yet to demonstrate its full mandate in this area; (iv) The Ministry of Water Resources, Works and Housing (MoWRWH) - is responsible for developing building regulations, and policies affecting buildings development. As noted previously the MoWRWH is currently leading the development of a new National Housing Policy; (v) Ministry of Transportation – by virtue of its influence on road construction and maintenance, and by virtue of the importance of roads to economic development in Ghana, the MoT plays a significant role in sustainable development within the built environment sector; (vi) the Ministry of Harbours and Railways – is responsible for port and railway development in Ghana; (vii) Environmental Protection Agency (EPA), now an agency under the MLGRDE, is primarily responsible for enforcing the EIA process. It has also developed various laws such as for noise abatement, and these are reflected in local government bye laws. The EPA also facilitates the Strategic Environmental Analysis (SEA) process prescribed for all new Government Policies, Strategies and Programmes

In the case of regional Government and local Government, Ghana's decentralization vision is for a decision making structure in which the local government becomes the ultimate decision making authority for local development. The institutional structure comprises 169 Metropolitan, Municipal and District Assemblies (MMDAs), ie the local authorities, and 10 Regional Coordinating Councils (RCC.s). The NDPC acts as a

coordinating body at national level working primarily in conjunction with the MLGRDE and MOFEP.

The aim is to have each MMDA as its own planning authority. The District Planning Coordinating Unit is a statutory unit of the DA established by virtue of s.46 of Act 462 (1993). It reports direct to the politically appointed District Chief Executive. Service departments report to the District Coordinating Director, who is the principal officer of the DA. 24 sections of Act 462 are devoted to planning matters, ranging from preparation of the district development plan to the making and enforcement of building bye-laws. It is reasonable to generalize that service delivery is responsive to the needs arising from the planning process although this is often de-railed by short-term crises such as flooding .

Medium Term Development Plans (MTDP - the name by which the District Development Plan is known) originate at District Assembly (DA) level, and are coordinated at the Regional Coordinating Council (RCC) level, passing up to the national level where they are, in theory, related to sectoral and national policies. However, the 3-5 year MTDPs primarily relate to the limited funding directly received by the DAs and they exclude the substantial funds spent at local level by the regional branches of sectoral departments such as Health, Education and Transport. Current practice therefore means that Government and Development Partner investments in transport infrastructure, Government investment in schools, healthcare facilities and centrally provided housing are all excluded from the MTDPs and from the local development planning process.

The decentralisation vision requires a new planning and budgetary process to capture all capital and recurrent local level expenditure, including that of the currently centralized departments. Coupled with this process is the concept of composite budgeting, whereby budgets relating to the various sectors will be integrated into a single DA budget with direct composite allocations from central government.

Presently most rural DAs have limited staff and other resources. Substantial expansion of those resources will be needed in order that the DAs are able to deliver the services devolved to them. It is generally recognized that many DAs will still have limited implementation capacity and it is proposed that the RCCs be strengthened through the creation of a core team of experts who would undertake technical assistance and “*back stopping*” functions in addition to their traditional coordinating and monitoring roles.

In the case of Non-governmental organisations, such as representatives and trade bodies, there is a move to increasingly involve them in policy formulation. Whilst there are over 2000 NGOs appearing on the UNDP register, there is only a small number of credible NGOs with a reputation for objective critical analysis of Government policies, strategies and programmes. Some provide direct representation for built environment stakeholders such as the Association of Road Contractors (ASROC). There is little evidence of formal consultation between Government and NGOs in Ghana however, they have recently been included in the circulation lists and public consultations for the development of the National Transport Policy.

In the case of policy setting bodies for the built environment sector, historically it has been the Architects Registration Council of Ghana under the authority of the Ministry of Works and Housing that has taken the lead in the buildings sector. The policy making bodies for transport infrastructure are primarily the Ministries, Departments and Agencies of the road sub-sector. In the case of the roads sub-sector, medium term objectives have been set out in the Road Sector Development Programme (ROG, 2002). Whilst latterly reflecting some of the growth and poverty reduction objectives and being described as ‘*an integrated approach to road maintenance, construction and management*’ (ROG 2005a) RSDP is, never the less, orientated only to the Roads sub-sector and, as noted by several observers, contains many priorities set by development partner policies.

There are indicators of change such that the consultation process for developing Ghana’s first National Transport Policy has brought about improved coordination between the transport sector ministries and, as noted previously, the Ministry of Works Rural Water

and Housing is currently developing policies on building regulations and housing with wide-ranging consultation. The primary responsibility for policy formulation associated with the built environment sector in Ghana falls to three ministries:

1. The Ministry of Public Works and Housing (MPWH) – in the areas of housing, building development in general and water infrastructure.
2. Ministry of Roads and Transportation (MRT) – in the area of roads construction and maintenance.
3. The Ministry of Local Government, Rural Development and Environment (MLGRDE) – with oversight responsibility for ensuring ‘enforcement’ procedures are in place with all Metropolitan, Municipal and District Authorities

In the case of professional, educational and research bodies, there are bodies representing most built environment professionals. Whilst there are no formal consultation processes for involving professional bodies in policy formulation; the Architects Registration Council of Ghana, itself a Government Agency, is heavily involved in coordinating activities associated with building regulations and planning processes; and the Ghana Institution of Engineers (GIE) is regularly consulted. Similarly, there are no formal mechanisms or mandates to include research bodies or universities in policy formulation although both the Buildings and Road Research Institute (BRRI) and the Kwame Nkrumah University for Science and Technology (KNUST) are also referred to in their recognised areas of expertise. The consultation process for the recently completed National Transport Policy has set a new benchmark for public participation; it was widely distributed to a representation of transport stakeholders, there were regional workshops attracting over 400 representatives and a national workshop involving over 150 organisations.

Although there is a general expectation that architects and engineers will consider the environment in their professional duties, none of the professional bodies in Ghana are known to have specific policies or strategies concerning sustainable development.

5.3 The regulatory and law enforcement environment

5.3.1 The UK Case study

National and Local Government bodies are the primary regulators of sustainable development in the built environment sector. However, as has been determined previously, many organizations play a role in their formulation.

For example, the Department of Communities and Local Government (DCLG), formerly the Office of the Deputy Prime Minister, is responsible for developing building regulations. Building Regulations exist principally to ensure the health and safety of people in and around buildings. The regulations apply to most new buildings and many alterations of existing buildings in England and Wales, whether domestic, commercial or industrial.

The development of Building Regulations is underpinned by scientific research. Government (the relevant Secretary of State) is advised by the Building Regulations Advisory Council (BRAC) on the exercise of their power to make Building Regulations. A Building Regulations Ministerial Round Table formed of industry stakeholders and government advises on the future of the Building Regulations and there is a requirement to carry out a Regulatory Impact Assessments (RIAs) to assess the costs and benefits of a policy proposal and the risks of not acting.

Planning and Building Regulations are enforced by local government planning and building control departments. There are well established procedures which are consistently enforced. Failures are sanctioned and in the case of breaches of health and safety regulations, these can result in criminal offences including prison sentences.

Guidance on the Building Regulations, is widely available in a wide range of publications and on UK government web sites.

The Department for Communities and Local Government (DCLG) is also responsible for dissemination and coordination of the Construction Products Regulation (CPR) in UK. Enforcement is carried out by Trading Standards Officers in England, Wales and Scotland and by Environmental Health Officers in Northern Ireland.

Implementation of the CPR also includes briefings with private sector trade associations representing particular products as follows: Admixtures; Emergency and Panic Exit devices; Fixed Fire Fighting systems; Geotextiles; Precast Concrete products; Structural Bearings; Thermal Insulation; Stone; Wood-based panels.

The EU's Standing Committee on Construction (SCC) is the main policy forum for the development and implementation of the CPD throughout Europe. It is chaired by the European Commission, and its members comprise delegations from the 25 Member States. The Committee debates all matters relating to the CPD, and, crucially, takes votes on attestation of conformity levels, and gives opinions on draft product mandates. The Committee generally meets up to four times a year.

Enforcement of European Standards, in general, is carried out by National Standards Bodies of Nation States which is the British Standards Institution (BSI) in the UK.

Development standards for roads infrastructure are determined by the national and local government agencies responsible for maintaining the asset. For example, the Highways Agency (HA, 1998) has set investment criteria for road development including: performance standards for Safety; Environmental; Economic; Accessibility; and Integration concerns. These high-level considerations of broad ranging sustainability criteria are reinforced throughout the design and construction process. For example, Volume 10 of the Highways Agency Design Manual for Roads and Bridges (HA, 1998) is dedicated to Environmental standards for a range of issues including: new roads, improving existing roads, landscape management, nature conservation, environmental barriers, archaeology and general guidance documents for use in the design process.

There are a wide range of ‘Chartered’ professional bodies, recognized in law and with enforceable standards of professional conduct by their members. For example, there is an Architects Registration Board, guided by the Architects Directive and the Draft directive on the recognition of professional qualifications in the EU. There is also a Competent Person Scheme which allows individuals and enterprises who are competent in their field, to self-certify that their work complies with the Building Regulations.

As noted for policy formulation and coordination, Research Institutes and Universities play an important role in the development of regulations and standards for the Sector. The Building Research Establishment (for buildings) and the Transport Research Laboratory (for roads) have played a prominent role in developing environmental and sustainability standards for the built environment sector.

5.3.2 The Ghana Case Study

Government and Local Government bodies are the primary enforcers of regulation affecting the built environment sector. As identified previously, there is little direct regulation aimed at implementing sustainable development. Furthermore, there is widespread failure to enforce the existing laws and regulations, which means that even basic standards of development and construction are not achieved (AAG, 2002). There are regular structural failures (Akoto, 2002), unregulated development and accidents on construction sites.

Environmental assessment is carried out on projects funded by Development Partners but, despite the establishment of the Environmental Assessment Regulations (ROG, 1999b) virtually missing on government funded projects. Social safeguards, mainly associated with resettlement, are either missing or woefully late in their application most often due to a conflict of interests and responsibilities between different Government departments and agencies. For example, in cases of displacement compensation it is necessary to reach agreements between the Lands Commission, Town and Country Planning Department and the relevant development agency such as Ghana Highways Authority.

The development of building regulations is in the hands of the Ministry of Water Resources, Works and Housing whilst enforcement is the responsibility of the Local Government. Whereas this is similar to the UK, in Ghana there are numerous examples of confusion and lack of clarity. For example, drainage in urban areas could be the responsibility of one of seven agencies, namely: the Ministry of Water Resources, Works and Housing; Ministry of Road and Transportation, Ministry of Local Government Rural Development and the Environment; Department of Urban Roads, Department of Feeder Roads; Ghana Highways Authority; and finally the Metropolitan Assembly covering the area.

The Environmental Protection Agency (EPA) is responsible for developing environmental standards and their application is meant to be achieved through the Environmental Impact Assessment. The EPA administers the EIA process, issues permits to developers, identifying mitigating measures to be implemented. There are few guarantees that the mitigating measures are ever implemented.

The Ministry of Finance and Economic Planning (MOFEP) sets Fiscal policy. Together with the Ministry of Energy and Ministry of Roads and Transportation, MOFEP is responsible for setting Ghana's Fuel Levy and other road user charges. Its purpose, and relevance to sustainable development in the built environment sector, is highlighted by the need to raise adequate funding for road maintenance and development. Current levels of Fuel levy fail to raise sufficient revenue for annual road maintenance requirement and therefore each year Ghana incurs additional international debts to maintain and sustain its existing road assets.

Architects are the only built environment professionals recognized by law. The Architects Registration Council oversees professional standards for Architects through the Ghana Institute of Architects. Currently the Ghana Institute of Engineers is progressing towards legal recognition

The Building and Road Research Institute (BRRI) is active in technical and materials research however its impact on the development of regulations is less clear. The BRRI has been exploring practical mechanisms for supporting the MMDAs in their enforcement role but no formal arrangements have been developed.

5.4 The environment in which policies, programmes and projects are implemented

5.4.1 The UK Case Study

The UK has a vibrant and varied built environment sector implementing policies, programmes and projects. An increasing number are orientated to achieving sustainable development.

In their assessment of the likely impact of sustainable development on the European property market, Windborne et al (2001), identified three built environment stakeholder groups primarily involved in 'implementation', namely: (i) Consumers, the occupiers, tenants and general users of buildings. It is this grouping that creates the demand for property, their shifting demands create changes and fluctuations in the rentable value of property and the longer term asset value of property. Consumers are driven by their organizational needs, meaning they bring influences from outside the built environment sector. Consumers they said, were one of the most influential 'movers' for sustainable development in the built environment sector; (ii) Demand-side Agents which were broken down into 4 sub-groups a) Property investors including pension funds and other fund managers who have long-term interests in the value of property as an income generator and as an asset; b) Property owners/occupiers with a long-term interest in a particular property which has to 'stack-up' in terms of investment criteria but which also represents the image and character of the owner; c) Property developers who, as the main agents, create the new supply of property. Their principle motivation is to create a short-term profit which, in its simplest form, is the difference between the cost of land, materials and labour and the sale value, that is the capital value of the finished building (Cadman et al 1995 in Windborne et al 2001); and d) Property Agents needing to provide high value services to the user market and to the demand-side of the property sector who generate and re-generate the building stock; (iii) Supply-side Agents consisting primarily of the Construction sector including: design consultancies; cost and project management consultancies; specialist consultancies such as environment, health and safety, quality

experts; contractors; materials and specialist suppliers; professional bodies and trade associations; centres of excellence for research and innovation in the industry.

Windborne et al (2001) reckoned that the supply-side of the sector is driven by the demand side, aiming to build what the demand-side required at the price the demand-side was willing to pay. This clearly coincides with the conclusions reached in CIB (1999) and UNEP/CIB (2002) when considering the demand-side stakeholders as major drivers for sustainable development. The point being made by Windborne et al (2001) was that, unless demand-side stakeholders 'value' sustainable development they are unlikely to pay for it and, as a consequence, supply-side stakeholders will only be willing to supply 'unsustainable' solutions. Windborne et al (2001) reinforced this case by noting that supply side stakeholders were unwilling to take financial or reputational risks by introducing any aspect into a buildings design that had not been requested by the client.

In building the business case for sustainable property development, Windborne et al (1999 and 2001) identified a range of issues emerging as critical drivers but noted in their assessment (2001) that little had changed in the two years between their reports. They noted that, built environment stakeholders compared poorly with industrial corporations who were engaging in eco-efficient manufacturing, environmental management and recycling as well as increasingly reporting on the environmental and social impacts of their business.

On the positive side however, the UK Government, as consumer and client to the built environment sector, has played a particularly important role in implementing sustainable development through the introduction of social and environmental requirements in both transport infrastructure and building specifications. In this case, the supply-side Agents have been motivated to respond with more sustainable design and construction practices.

In the building sector, for example, the Government has used mechanisms such as specifying high BREEAM ratings in public sector buildings and more recently 'ECO-HOMES' ratings, to drive up standards in the built environment. In the area of transport

infrastructure, by linking funding to declared objectives, UK government has ensured that funding is based on, and fully integrated with, locally determined development priorities. Important transport infrastructure clients like the Highways Agency have introduced whole volumes of environmental and sustainability design factors into their Design Manuals (HA, 1998) for roads and bridges. This has brought the necessary response from the supply-side of the Sector.

The overall conclusion is that Government and the private sector play distinctly different roles in the implementation of policies, programmes and projects. In the case of sustainability standards, implementation lags behind policy formulation. However, the demand-side stakeholders as described by Windborne et al (2001) and including Government agencies, are critical drivers for sustainable development in the built environment sector. The short-term, client focus of supply-side stakeholders continues to be a barrier to the internal generation of performance improvements for sustainable development and therefore limits the full performance potential of this stakeholder group and the sector as a whole.

One area of continual concern, identified by organizations like UNU/IAS (2002, and UNDP (1999), has been the need for new skills and competencies, to manage the increasing demand for good governance and sustainable development. Whilst an established educational framework provides a good supply of well trained professional and technical personnel, there are concerns about skills shortages (UoS, 2001) in various trades and in areas of basic management such as procurement. The need for new skills and competencies has also been identified for UK built environment professionals in reports such as FfF (2000), Egan (2002 and 2003) and Edwards (2003). A general theme emerges for skills to deal with a wider-ranging decision-making environment populated by increasingly diverse stakeholders.

Finally, and as indicated by articles in the UK's construction press (Smith, 2006 and Abley, 2006) corruption is a continuing issue in the UK's built environment sector.

Examples quoted affect procurement procedures rather than wide-scale subversion of basic laws and regulations.

5.4.2 The Ghana Case study

In the case of formal development, the dominance of Governmental organizations in both policy formulation and implementation is evident throughout the built environment sector. The Ministries of Water Resources, Works and Housing (MWRWH) and Roads and Transportation (MRT) retain primary responsibility for the implementation of infrastructure development projects, whether funded by Government or Development Partners, including roads, water supply and housing. A far wider range of Ministries, Departments and Agencies (MDAs) have responsibility for other infrastructure development. For example: Ghana Ports and Harbours Authority (GPHA) for port construction, Ghana Railway Corporation (GRC) for railway construction, Bulk Oil Storage and Transport (BOST) for pipelines and oil storage facilities, Volta Lake Transport Company (VLTC) for jetties around Lake Volta.

There are a few large private and State Owned Enterprises (SOEs) that create demand for built environment facilities such as Ghana Bauxite Company, Ghana Cement Company and COCOBOD. In general the potential influence of private sector manufacturing and commercial activities is dispersed and difficult to assess.

Informal development is widespread although mainly affecting the urban centres such as Accra and Kumasi. Trespass of Government land is commonplace. However, Government as regulator, and National Government as policy maker seem both unwilling and unable to stem the growth of informal developments. Construction materials are often recovered from other sites and generally of poor quality. Construction standards are poor leading to unsightly, unsafe structures and un-healthy dwellings; as was regularly raised by participants in the national workshop on governance and the built environment sector and reported in Chapter 6.

A major study commissioned by the Government of Ghana, funded by the African Development Bank and involving transport and built environment sector stakeholders (WSP 2006) found that Government institutions in the Transport Sector play a significant role in Ghana's built environment sector. It was found that the road sector receives 99% of all investment from Government and development partners in the transport sector and that, at that time, the Ministry of Roads and Transportation was the 3rd largest spending ministry in Ghana (after Ministry of Health and Ministry of Education). The Ministry, its departments and agencies play a lead role in policy formulation, regulation, enforcement, and that of primary demand-side stakeholder for Ghana's built environment sector. By analyzing the mandate, functions, roles and responsibilities of sector organizations, the Study (WSP, 2006) identified how large scale infrastructure development projects were carried out by Government Departments and Agencies reporting to their 'mother' ministries. It concluded that, whilst around 85% of all construction work was contracted out to private sector contractors the lack of functional separation between policy, regulation, asset management and service provision throughout the government institutions, was a major barrier to performance improvement in the sector. In fact, the WSP study, along with other studies undertaken by Government (Donkor 2004, Sam et al 2005, ROG 2007b, Gilham et al 2007) have identified serious deficiencies in the governance, management and supervision of built environment projects including both public and private sector stakeholders. For example, Agencies such as the Ghana Highway Authority (GHA), still performs as a department of its 'mother' Ministry; despite having a separate legal identity and an independent board of Directors.

In particular the poor state of road sector contracting is well documented (Sam et al, 2005) and remains a major barrier to performance improvement in the sector

The lack of leadership by Government and the lack of demand by corporate clients also mean that Ghana's built environment sector lacks two significant drivers for sustainable development. In this case, the role of Ghana's Development Partners has been particularly important. Infrastructure projects funded by development partners consistently apply environmental and social conditions and through rigorous monitoring

and evaluation, these are successfully applied. It appears that the inevitable involvement of foreign consultants and construction firms in major development projects brings skills, competencies and disciplines which facilitate knowledge transfer and performance improvements in those areas.

Technical capacity in Ghana's public and private sectors is inadequate for the rate of development taking place at this time. Over the last few years government agencies have attempted to outsource and privatize construction and maintenance functions. Whilst moderately successful, the process has been hampered by low skills levels, poor management training and lack of suitable finance for small and medium sized contractors (Sam et al 2005). Government has also failed local contractors by over commitments and delayed payments, causing work to stop on contracts and driving many SMEs into liquidation.

The Supply-side of Ghana's BE sector is dominated by a few large international contractors, a limited number of medium sized local contractors and a large number of small scale mostly informal, contractors. In general, construction specifications and professional practices remain outdated with no evidence of more recent forms of contract in use such as partnering, design, build and operate, design and build, construction management, etc. There are some examples of simple Design and Build contracts in use although there is no evidence in professional CV's of experience of anything other than the standard form of buildings contract.

Corruption in Ghana's built environment sector remains a significant concern. It has been noted Adei (2004) how most incidents involve government officers and many private companies budget for the inevitable payments associated with contract awards and payments.

Whilst none of the studies mentioned above (Donkor 2004, Sam et al 2005, ROG 2007b, Gilham et al 2007) had a specific 'sustainability' agenda the findings indicate serious flaws that lead to unsustainable practices and the failure to achieve even basic standards

of construction. For example evidence from WSP (2006) indicated that inadequate funding allocations to maintain existing roads and poor construction standards caused more frequent rehabilitation costs and higher vehicle operating costs, countering the Government's strategic poverty reduction targets of reducing overall cost of transportation to users.

As has been noted in 5.1 above Ghana is virtually devoid of sustainable development policies and strategies that impact directly on the built environment sector.

With the exception of Government's recent commitment (ROG, 2005c) to carry out Strategic Environmental Assessments on new policies, strategies and programmes and the existing requirement for Environmental Impact Assessments (ROG, 1999) to be carried out on all major development projects, there are few practical demonstrations of environmental sustainability principles. There is, in fact, considerable evidence to demonstrate the opposite. For example, road construction consumes large amounts of natural materials. Concrete is one of the main construction materials for both infrastructure and building construction and this has led to increasing imports of cement and steel reinforcement resulting also in shortages of aggregates from quarries throughout Ghana. There are national shortages of construction aggregates (ROG, 2005a and 2008c). Many traditional forms of construction are being neglected for heavily mechanized and highly engineered solutions. The problem is further compounded in the cases where funds have run out and mechanized plant and over-engineered structures have gone to waste due to neglect and lack of maintenance.

The annual construction products exhibition reveals that, with the exception of locally produced aggregates and timber, most construction materials and equipment are imported. This in turn adds disproportionately to the cost of construction because, unlike developed countries, the cost of materials is far higher than the relatively low cost of labour. Higher imports also increase the demand for foreign currency on Ghana's economy.

In practical terms, the researcher has visited several locations on Ghana's extensive coastline to witness sand being 'won' directly from the beach and taken straight to local construction sites; unwashed, un-sieved and therefore prone to high salt contents leading to early structural erosion and structural collapse. Timber for construction is mainly home-grown. Forestry stewardship schemes are inconsistently enforced and tend to relate solely to exported timber products which have declined in recent years.

Seemingly, Ghana's built environment sector faces many challenges in the attainment of basic good practice let alone the implementation of sustainable development.

5.5 Conclusions from Case Study Analysis (5.1, 5.2, 5.3, 5.4)

In this section conclusions are presented from the analysis of the current governance arrangements in the Built Environment sectors of the United Kingdom and Ghana to identify gaps in, and synergies with, the theoretical governance framework. The aim was to test the global applicability of the theoretical governance framework and identify if additional Components, Groups and sub-Groups would be necessary when considering the existing: (i) Policy and Regulatory framework; (ii) arrangements for policy formulation (iii) arrangements for development and enforcement of regulations; and (iv) arrangements for implementing policies, programmes and projects.

5.5.1 The Policy and Regulatory Framework (as presented 5.1)

In the UK there is a complex policy framework for sustainable development consisting of national, regional and local policies and procedures. National policies reflect international objectives for sustainable development such as reduced green house gas emissions and international trade. They also reflect European Union policies and Directives. UK regional and local development policies reflect national objectives.

The policy framework affecting Ghana's BE sector is expanding. Within the Comprehensive Development Framework, Ghana's national development agenda is largely determined by the strategic objective of poverty reduction and more recently 'Growth'. The MDGs provide the impetus for social and environmental objectives in Ghana although, in the overall policy framework, environmental objectives are noticeable in the minority. All objectives are embedded in the national development strategy and, where they exist, replicated in sectoral policies. NEPAD and ECOWAS agreements and conventions are imposing demands on Ghana's built environment sector mainly in the form of sub-regional coordination, and the development of sub-regional transport corridors as well as standards of construction required for internationally funded development.

Previously, planning for development in Ghana's built environment has been short-term, focused on specific needs and subject to change at short notice. However, the policy making environment is undergoing a dramatic re-orientation to include the longer-term, international, sub-regional, national and local issues noted above. The emergence of both a National Transport Policy and National Housing Policy herald a significant change to a policy-led decision making and performance setting environment for Ghana's built environment sector.

It becomes clear in the analysis of the policy framework for sustainable development that there are stark differences in the objectives for sustainable development between the UK and Ghana. This can best be summarized as follows:

- Sustainable development in the UK comprises a process of balancing economic, social and environmental impacts, to bring about general improvements in performance on the back of existing development.
- Sustainable Development in Ghana, is development itself and this is largely defined by the country's poverty reduction strategy (the primary need to generate wealth and distribute it to the poor), the country's priority millennium development goals (economic, environmental and social goals set by the international community) and various public sector reform and institutional development programmes. The emphasis on economic growth as the dominant factor in Ghana's development agenda is reinforced by the shift to a 'Growth' agenda in the Growth and Poverty Reduction Strategy (ROG; 2005c).

The national development agenda, as identified above, was not identified in our analysis in Chapter 4 of CIB (1999) and UNEP/CIB (2002) when building the theoretical governance framework. Whilst UNEP/CIB (2002) identified a hierarchy of issues to which the built environment sector could be expected to aspire, the importance of the national development agenda identified in both case studies was not captured sufficiently. It suggests therefore that an additional Group 'National Development' should be added to

differentiate between the global and national perspectives. On the basis of both case studies it is suggested that its Sub-Groups should include: (i) Poverty reduction (ROG, 2005c); (ii) economic growth and development (ROG, 2005c); (iii) sustainable consumption and production (UKGOV, 2005); (iv) Climate change and Energy (UKGOV, 2005); (v) Natural resource protection and environmental enhancement (UKGOV, 2005). Due to the importance given to sustainable communities over sustainable settlements in the UK Sustainable Development Strategy (UKGOV 2005), it is also suggested that the Sustainable settlements Group is renamed Sustainable Communities with 'settlement' issues becoming a sub-Group.

The UK's regulatory framework includes European Union Directives that are converted into national laws and regulations. This creates a range of both EU-derived, for example EU (2006a), and National regulations and procedures aimed at sustainable development. Amongst a broad range of environmental laws, there is an increasing number specifically targeting the built environment sector.

Also in the UK, there has been a long-standing strategy for sustainable construction specifically setting out sustainable development goals and objectives for the built environment sector. An increasing number of policies, social and environmental objectives have been set by clients, as Demand-side stakeholders, for organizations, individual projects and developments. This reinforces the importance of the Sustainable Construction Grouping in the Purpose component of the theoretical governance framework and demonstrates the gap that exists in a single purpose for the built environment sector in Ghana.

In the UK national building regulations are consistently updated and now include specific issues on sustainable development. Government design standards for infrastructure development include environmental and social concerns. The development planning process is defined by national, regional and local development plans, underpinned by a comprehensive process of planning applications. The 'planning gain' procedure gives a

practical mechanism for local government to ensure that private developers make a contribution to sustainable development for each development.

Whilst the development of Ghana's policy and regulatory framework for sustainable development lags behind the UK, in both cases, the range of issues affecting the built environment has expanded to include:

- International policies and objectives (WSSD objectives, MDGs and other international conventions)
- Regional (for example: EU and AU) and sub-regional (ECOWAS, SSATP) policies and objectives
- National sustainable development goals and objectives (As defined by the respective sustainable development strategy documents)
- Regional and local policies and objectives.(As mandated by respective decentralization policies and laws)

It is evident therefore that in the case of both the UK and Ghana, the regulatory framework has expanded but to differing amounts. With the absence of legally enforceable measures at the international level, the highest order of regulation emerges from the Regional governments of the EU and AU. Whilst currently, it is only the EU which has produced replicable directives for sustainable development affecting built environment sectors in Europe, it is reasonable to assume that the AU could be a similarly powerful authority in the future. EU, and potentially AU, directives therefore have a direct impact on performance standards in the respective built environment sectors. These arrangements are reflected in the Purpose, Key Driver and Stakeholder components of the theoretical governance framework.

At the moment, the highest level of regulatory concern in Ghana's BE sector is the need for sub-regional harmonization of standards affecting transport infrastructure although, in practice, these affect the provision of transport services and their regulation far more than the provision of built environment infrastructure. There is no known sub-regional

measures affecting the ‘buildings’ side of the built environment sector. In Ghana, key regulatory drivers are limited to national planning, environmental and building regulations supplemented by social, environmental and construction standards set mainly for internationally funded infrastructure projects. Therefore, the importance of Government policies and regulations as Key Drivers is well documented for both the UK and Ghana. Through the increasing influence of Demand-side stakeholders on the Supply-side stakeholders in the UK, it is evident that Key drivers such as the ‘Market’ and professional and technical performance standards will become increasingly important drivers for sustainable development in both the UK and Ghana.

5.5.2 Arrangements for policy formulation (5.2)

In the case of both the UK and Ghana, policy formulation is lead by Government. However there is a stark difference in the range of stakeholders involved in the process.

Policy formulation in the UK is a multi-stakeholder process. Institutions representing public, private and civil society interests are well established, resourced and informed. There are formal and informal mechanisms available to policy makers and stakeholders and, as a result, all policies and changes to regulations, etc, are subject to rigorous consultation.

In Ghana policy formulation is largely the domain of Government. Formal mechanisms, as exist in Government’s advisory committee structures, have not been maintained. Cases can be cited where individual ministers have issued policy statements that have subsequently driven whole development programmes. The situation is changing. Under the umbrella of the national development policy, and the requirement for coordinated sectoral policies and strategic environmental assessment for all Government policies, more wide ranging consultation is taking place. However, the process is in its infancy due to the lack of formal mechanisms and suitable institutions mandated to represent sectoral interests. Studies have revealed a significant gap in functionality and capacity for effective policy formulation and coordination. Studies have also identified a general lack of skills and experience in stakeholder consultation at the policy formulation level in both

public and private sector organizations thus reinforcing the relevance of the Performance Management Group of the Capacity Component in the theoretical governance framework.

Further more, the findings from both case studies suggest that Government facilitation is a Key Driver and that an increasing number of Stakeholders are engaged in policy formulation. Both situations are captured in the theoretical governance framework.

5.5.3 Arrangements for developing and enforcing Regulation (5.3)

Where regulations exist and where enforcement mechanisms are in place ‘regulation’ becomes a Key Driver for sustainable development. In the UK, a comprehensive array of laws and regulations are in place to set out process and performance standards suitable for sustainable development. Formal mechanisms also exist in the UK to engage stakeholders in the development of both formal regulations and voluntary standards. Responsibilities for enforcing building, planning and various environmental regulations are clearly defined. Enforcement agencies are well resourced and enforcement is consistently applied.

Ghana’s Building Regulations (ROG, 1996) are based on UK building regulations of the 1990’s and lack any consideration of environmental or social issues. The single most effective mechanism for improving environmental performance in Ghana is the Environmental Impact Assessment (EIA) although this is inconsistently applied. Local planning and buildings approval processes are the responsibility of local government and are often negated by lack of human resource capacity and corruption. There is considerable inconsistency in the application of land use and development planning regulations as they exist.

Ghana’s laws and regulations lack the complexity and scope of those in the UK. Whilst this is not a bad thing, there is a need to ensure that they are properly targeted and enforced. Where this occurs there is evidence of improved performance. However,

widespread evidence of corruption and the lack of ‘political will’ and capacity to enforce even basic standards by the responsible Agencies is of significant concern.

The findings from both case studies confirm the importance of Key Drivers such as Policies, Laws and regulations in achieving sustainable development. Perhaps most importantly the findings reinforce the importance of the Government facilitation Group of the Key Driver Component, in achieving not only sustainable development but basic performance standards throughout the sector. Without the key driver of ‘enforcement’ all policies, laws and regulations are worthless.

5.5.4 Arrangements for implementing policies, programmes and projects (5.4)

The influence of Government as policy maker, regulator and major client to the Sector is significant in terms of implementation in both Ghana and the UK. The UK Government has instigated reporting and funding allocation practices that aim to mainstream sustainable development objectives into national, regional and local decision-making and implementation mechanisms. It is the UK Governments’ approach to planning and procurement of the built environment which deserves special attention. As client to the Sector, Government has set sustainability performance standards for its buildings and infrastructure developments. This has created an environment where demand and supply-side stakeholders have responded with increasing effectiveness.

Evidence from Ghana indicates the opposite. Government funded projects are known to fail in achieving even basic environmental standards as required by law. There are also significant delays and failures caused by poor quality and fiscal management systems. A lack of Government investment in buildings and infrastructure maintenance means that built environment assets, like roads and government buildings, fail to provide basic levels of accommodation and/or service. For example, the failure to implement basic principles of road maintenance economics and performance management throughout the roads sub-sector means that Ghana’s road assets are economically unsustainable, cost users more in running costs, cost Government more in remedial works and require Government to borrow unnecessarily from international monetary organizations and development

partners. Where funding is provided for maintenance purposes, local supervision is inadequate to oversee poorly equipped, trained and resourced contractors. Contracts consistently fail to deliver on the fundamentals of cost, quality and time.

The UK's demand and supply-side stakeholders comprise Government and private sector. In regard to buildings, corporate clients are a significant influence on both demand and supply side stakeholders. The demands of the built environment's corporate clients to satisfy their own investment and corporate governance measures, are increasingly important drivers for improved sustainability performance within the Sector. These Key Drivers are reflected in the Fiscal Measures and 'Market' Groups in the theoretical governance framework.

The highly informal nature of Ghana's private sector and the lack of locally driven social and environmental investment criteria means that Ghana's built environment sector lacks important Key Drivers such as those imposed by corporate clients and the 'market' in countries like the UK. Whilst there is embryonic interest in Corporate Social Responsibility from some Ghanaian corporations, there is only limited evidence of this influencing the built environment sector. Therefore, the lack of leadership by Government and the lack of demand by corporate clients means that Ghana's built environment sector lacks significant drivers for sustainable development. In some cases, the role of development partners has been important. Infrastructure projects funded by development partners consistently apply environmental and social conditions and through rigorous monitoring and evaluation, these are relatively well applied. Currently, there is no evidence of demand for improved sustainability performance in Ghana's built environment sector from national or foreign corporations. However, the seemingly inevitable involvement of foreign consultants and construction firms in major development projects brings skills, competencies and disciplines which facilitate knowledge transfer and performance improvements in those areas.

Further more - Technical capacity in Ghana's public and private sectors is inadequate for the rate of development taking place at this time. Over the last few years government

agencies have attempted to outsource and privatize construction and maintenance functions. Whilst moderately successful, the process has been hampered by low skills levels, poor management training and lack of suitable finance for small and medium sized contractors. Government has also failed local contractors by over commitments and delayed payments, causing work to stop on contracts and driving many SMEs into liquidation. These conditions suggest that the lack of 'financial' capacity is a significant barrier to improvement in performance and the addition of a new Financial Capacity Group should be considered.

Gaps in Technology Capacity, especially the use of information technologies (IT), are also evident throughout Ghanaian organizations. Where used, IT solutions provide dramatic improvements in efficiency and effectiveness of operations suggesting a particular importance for the Technology Group of the Capacity Component in the theoretical governance framework.

The Supply-side of Ghana's BE sector is dominated by a few large international contractors, a limited number of medium sized local contractors and a large number of small scale mostly informal, sole traders. In general, construction specifications and professional practices remain outdated and, with the exception of some simple design and build contracts, there is no evidence of more recent forms of contract such as partnering, design build and operate, construction management, etc. being used.

Whilst there are skills shortages, the UK BE sector is largely populated by well trained and professionally competent people. Professional standards are set by well established and legally recognized professional bodies. A wide range of contracts are used including public private partnership (PPP), partnering, design build and operate (DBO), design and build (D&B), construction management, etc.

The differences between the UK and Ghana in the use of modern forms of contract, technologies and practices suggest a gap in the Capacity of the Ghanaian built

environment sector to embrace change. This should be considered for inclusion in the current Capacity Component of the theoretical governance framework.

CHAPTER 6

A validation case study with built environment policy makers and practitioners in Ghana

CHAPTER 6 contains the results of the second test of global validity for the theoretical governance framework. Ghana was used as a case study in which a contingent valuation approach identified and compared the preferences of local policy makers and practitioners with the theoretical governance framework. Data was collected in the controlled environment of a national workshop through 4 focus group sessions in which over 120 built environment professionals participated and including papers submitted by 11 keynote speakers selected for their expertise and standing in the areas of good governance and the built environment sector.

Therefore this Chapter contains a report on the issues presented, and opinions expressed, by the 120 participants and 11 keynote speakers (6.1) and an analysis of those issues in comparison with the theoretical governance framework (6.2).

Preparations for the national workshop and PhD research methodology are described in Chapter 3. APPENDIX 1 contains illustrations of the charting technique used by the author to carry out the qualitative analysis of speakers papers.

This Chapter concludes Research Objectives 3 and 4.

6.1 Governance issues identified by Speakers

The issues presented, and opinions expressed, by the 120 participants and 11 keynote speakers have, through analysis, been grouped together under the following headings.

6.1.1 The importance of governance for national development

Minister Owusu-Adjapong (2004) said that the lack of governance had lead previously to the failure of national development targets. He said that, *'in contemporary times, Good Governance has become a theme that has assumed central place in discussions on development issues.'* Good governance, he said, should be the highest priority in order to achieve Ghana's current aims of *'middle income status'* and the *'golden age of business'*.

The centrality of governance as an enabler for national development was reinforced by Keynote speaker Adei (2004) who said that *'if our country is able to address the critical governance issues, 75% of our development problems will be solved.'* He suggested that if governance structures were in place, Ghanaians would be motivated and enabled to make the most of their development opportunities. Adei (2004) also confirmed the importance of the governance framework in understanding and addressing governance issues. However, Adei's view (2004) was that the current state of governance thwarts every effort of Ghanaians to develop. He highlighted three serious governance issues related to national development, all of which impact badly on the built environment sector: (i) Land acquisition – this is of major concern particularly for the built environment sector and a situation which he says 99% of Ghanaians are fed up with. He says that *'a few families and chiefs are holding the nation hostage'*; (ii) Corruption – *'Corruption in Ghana is so pervasive for so long that studies show that the private sector actually budgets for it.'* Adei (2004) relates this to, what he calls, bureaucratic inertia caused by years of *'bad leadership, over politicization of the system especially in our recent past, the abandonment of systematic career rated training and capacity building; low morale which is itself, a combination of bad leadership, management and low incentives.'* Adei (2004) concludes this issue by saying that *'despite all the fine men and*

women in the Public Service, the system is not working'; and (iii) Rule of law – Adei says that levels of corruption and crime are directly related to the probability that a culprit will be tried and judged expeditiously. He says that *'Unless we tackle the justice system development will be stunted and construction will suffer.'* He uses the issue of 'contract enforcement' as an example of how the rule of law breaks down in the built environment sector. Contracts, he says, must be respected and enforced. Where a contractor is not paid for work completed, the contractor suffers a great loss when interest rates of around 30% per annum are applied to his overdraft. Late payment creates a great loss to the contractor. Adei (2004) says that in case of default, an aggrieved party should expect redress in a reasonable time. The need for reform of the judicial process for commercial disputes has already been reported (Danida, 2003).

Finally, in regard to the wider issue of sustainable development and the state of the environment in Ghana, Asafo-Boakye (2004) said that *'In the name of this so-called progress, we have destroyed our forests, nearly turning them into deserts; precipitation is dwindling and our rivers are drying up leading to loss of aquatic life; our soils have been deprived of cover leading to serious soil erosion and soil incapable of supporting meaningful agricultural practice.'*

He said that the need for balanced development had been recognised, yet as pointed out by Hon Minister Iddrisu (2004) people continued to live in conditions that were detrimental to their health and welfare. He pointed out problems such as uncollected garbage and filth, poor drainage and impassable roads, unsafe water supplies and inadequate infrastructure, polluted rivers, lagoons and fouled air, as environmental factors that *'reduce living standards and increase costs, loss of productivity and slow socio-economic development.'* Better governance of the natural and built environment is essential for improving people's lives and achieving sustainable national development.

6.1.2 The importance of the built environment for national development

The importance of the built environment in the context of national development emerges consistently in the analysis of Speaker's papers. Hon Minister Iddrisu (2004) said that government recognises the benefit of having a well organised, effective and efficient construction sector that offers its clients good value for money. As he said, *'not only do clients enjoy direct benefits like improved manufacturing and physical facilities, but also the government and the citizens of Ghana enjoy a better quality of infrastructure, more secure investment and a better quality of living environment.'*

The case for this builds with references by Dawuni (2004) to current national development policies, by Akwaboah, (2004) to history and by Asafo-Boakye (2004) to religious references. For example, it was recognised by Akwaboah (2004) that the equivalent of built environment professionals had played an important role in constructing the pyramids, viaducts and palaces for the Romans and Pharaohs and it was posited by Asafo-Boakye (2004) that built environment professionals had emerged to fulfil the process of creation and particularly the role of providing man with shelter and life supporting facilities.

In the more recent past, Akwaboah (2004) pointed out that invaders and occupiers of various nationalities had brought new construction technologies and new developments in the form of forts and castles. Colonial governments had been responsible for constructing harbours, railways, hospitals and schools as well as military barracks, police and prison establishments. According to Akwaboah (2004) colonial government had also encouraged trade to the point where, *'just under 50 years ago, at the time of independence of Ghana, there were hardly any indigenous consultancy firms for the built environment.'* Most consultancy work was carried out by foreign firms based abroad or working through local offices.

With independence, a new wave of development followed involving new universities, highways, harbours and cities such as Tema. As Akwaboah, (2004) pointed out, this

period also saw the development of professional bodies as well as the establishment of workers' brigades to represent different stakeholder groups.

In current day Ghana, the built environment sector continues to have a significant impact on national development. Several speakers pointed out that whilst the sector had only a small financial impact on GDP, its role as provider of infrastructure for other industrial sectors and the provision of housing for people was fundamental in achieving national development. Both Dawuni (2004) and Adei (2004) pointed out the importance of housing to national development. Adei (2004) said that housing development had '*over and over again proven*' to be a leading sector in national development. In fact, he pointed out that Singapore's economic '*take-off*' is largely traced to President Lee Kuan Yew's emphasis on housing every Singaporean in the initial stages of development. Dawuni (2004) went further when he said that '*the benefits of a sound, efficient and functioning built environment are enormous in terms of improving the quality of life of citizens, reducing incidence of disease and fostering environmentally friendly development.*' This was reinforced by Nico-Annan (2004) when he concluded that '*Even though in narrow economic terms construction may not have such a significant place in the national economy, in the wider social, political and economic sense the construction industry occupies a key position.*'

The financial significance of the built environment to individual Ghanaians was also highlighted by Adei (2004) when he pointed out that '*most Ghanaians spend all their life saving to build a house.*'

Whilst Nico-Annan (2004) and Adei (2004) both agreed that the built environment sector offered potential for gainful employment, from his contracting perspective, Nico-Annan (2004) also pointed out that employment in the sector could vary significantly from year to year as a reflection of the state of the economy. He pointed out two further issues: 1) that if things were bad, the economy could actually do without construction and 2) the sector could have an adverse affect on the balance of payments. The first point raised by Nico-Annan (2004) reflects a common problem for construction sectors around the world

that is the boom and bust cycle. In times of growth, investment in construction increases, yet in times of recession, investment in construction declines. The second point is typical of the disproportionately high cost of mostly imported materials against the disproportionately low cost of labour. Nico-Annan's points are therefore related in that, in times of recession, the high costs of imported materials are accentuated, thus accelerating the decline in construction activities. The situation he describes points to the need for more consistent planning and award of contracts by clients to even-out the boom and bust cycle although this cannot safeguard completely the influence of the global economy. Whilst not explicitly mentioned, the conditions he describes suggest the benefit of using locally produced materials and equipment to reduce the outward flow of money.

Agreeing on the importance of the built environment to national development, Akuffo (2004) went on to challenge the tendency of development in Africa to be measured in terms of economic benefit alone. At the root of his argument was the need to focus development on people and not focus solely on the requirements of financial or economic planners. He asked if participants knew exactly what was the meaning of targets such as 'raising per capita income', or attaining 'middle-income-status'? Development for people was essential, particularly he said, *'More often than not, it has been possible to demonstrate the apparent success of such plans in GDP terms, yet in all too many cases, these figures have concealed the fact that the benefits resulting from such economic growth have never reached a large proportion of people, the condition of many of the urban and rural poor failing to improve, or worsening.'*

It was argued by Akuffo (2004) that national development programmes and plans such as the Ghana Poverty Reduction Strategy (GPRS) must include the physical framework as well as the economic framework. Adei (2004) confirmed this argument by speculating that the growth rate of GDP could be doubled in 5 years by providing infrastructure linking Tema and Takoradi to all the regional capitals and with Ghana's land-locked neighbours – Burkina Faso, Niger and Mali.

Finally, it was recognised by Akoto (2004) that the built environment was the result of human interventions in the natural physical world and that a sustainable and efficient built environment was particularly relevant at local authority level. The importance of providing suitable housing, open spaces and life-supporting facilities such as schools, hospitals, roads, drains, water supply systems, irrigation systems and dams was highlighted for local communities. Whilst both Iddrisu (2004) and Nico-Annan (2004) pointed out the link between a healthy built environment and a wealthy nation, Akoto (2004) said that it also represented the spiritual, social, political, technological and aesthetic values of society.

It was generally recognised that the built environment sector made an important contribution to the visions and strategies for national development and the financial and political decentralisation throughout the country.

6.1.3 Strategic planning and sector effectiveness

Adei (2004) said *'It is a shame that, in our part of the world, the average sector lacks a clear road map – strategic plan – from which the various players can take a cue'*. He concluded that more needs to be done by way of national vision with clear sectoral goals to move the country from third world to first world. He said that *'the construction industry, as one of the linchpins, is crying for that'*.

Hon Minister Iddrisu (2004) confirmed how the workshop had helped to provide leadership for *'more effective policy making and maximization of the impact of public expenditure towards national development.'* And, the general conclusion of the keynote speakers and participants in the focus group sessions was that an overriding strategic plan for the built environment sector would provide the necessary direction and clarity of policy as recognised by Iddrisu (2004), and recommended by Adei (2004). As Dawuni (2004) pointed out there are seven ministries with direct responsibility within the built environment namely: Ministry of Works and Housing, Roads and Transport, Local Government and Rural Development, Environment, Lands and Forestry, Energy and

Ministry of Communications. There was a need for leadership and direction that could improve the effectiveness of the sector and particularly improve its effectiveness for national development.

Minister Owusu-Adjapong (2004) indicated some of the infrastructure priorities that might be included in a national policy, including: Roads; Telecommunications; Reasonably priced houses; and Waste Management facilities and systems. Owusu-Adjapong (2004) also pointed out the importance of adhering to planning schemes particularly in regard to the growth of slums and non-compliance to planning schemes and building regulations in general. *“There should be a national policy for compliance”*.

Adei (2004) had identified the need for an overriding strategy and Dawuni (2004) had identified the lack of clarity of policy and direction because of the multiplicity of Ministries, Departments and Agencies (MDAs) with responsibility for the sector. He identified the lack of co-ordination among key institutional actors in the sector and the lack of access to key resources such as land and finance as major problems leading to lack of governance and poor performance. For example, he says that *‘on several occasions when people have problems with land or wrong siting of a building they blame Ministry of Works and Housing, whereas the responsibility for development control is a local authority function’*. Another example is drainage, where responsibility is shared by 3 Ministries – Ministry of Works and Housing, Ministry of Local Government and Rural Development and Ministry of Roads and Transport. When there is a problem the public are unclear as to where to go. Where the responsibilities for infrastructure agencies are dispersed among Ministries Dawuni (2004) asks if there is not a benefit in consolidating them under a few Ministries or even merging some with very similar missions together. Therefore institutional coordination, looking at the structure of the MDAs and a streamlining of the roles of MDAs operating in the built environment sector, could help eliminate ambiguities, allow MDAs to complement each other’s efforts and provide the public with a clear understanding of who does what.

The importance of adhering to planning schemes and building regulations has already been noted by Owusu-Adjapong (2004). Dawuni (2004), in recognising the problems that exist in development control asked if the district assemblies could be assisted by the professional bodies to better scrutinize building plans and physical development plans and how the national shortage of planners could be overcome.

6.1.4 Land use planning and control

Issues raised by speakers included the problems of rapid urbanisation, basic problems with land registration and its availability for development, the creation of informal settlements, lack of affordable housing and conflicting government policies. Iddrisu (2004) pointed out the rapid transformation of human settlements in Ghana. He said that *'villages are growing to become towns and towns are developing into cities.'* Dawuni (2004) along with other speakers reinforced the need for proper land management systems. He pointed out the *'chaotic developments going on without regard to building regulations, the proliferation of land guards to enforce ownership of land granted by unscrupulous landowners to more than one person,'* as justification for more regularized land management, particularly a mechanism for releasing land for development.

He said that the Ministry of Works and Housing has already started a programme of establishing Land Banks around the country to facilitate housing development. He said that *'We may need to look at other similar moves elsewhere.'*

The link between governance, informal settlements and lack of development control was mentioned by several keynote Speakers. It was recognised that the lack of governance resulted in the development of low-income informal settlements (slums) and this was a particular concern at local authority level. In fact, Akoto (2004) argued that the forum could not ignore the issue of slum development particularly how informal communities were mushrooming in various settlements. He further argued that *'those of us involved in shaping the built environment should see this development in our towns as a major minus*

in our professional achievements.’ Owusu-Adjapong (2004) also drew our attention to the need for measures to check the growth of slums.

Akoto (2004) said that *‘Major culprits involved in ceding out, taken to mean handing out and allowing to pass into the hands of others, public open spaces include crooked developers, dishonest public officials, ignorant and irresponsible traditional heads, and some real estate developers.’* He said that *‘Local authorities and non-governmental organisations assisted by those of us directly shaping the built environment must coordinate and evolve effective strategies to safeguard and develop these vital spaces which are the ‘lungs of the city’ to quote Professor A.B. Akosa.’* Akoto (2004) also warned that the outcomes of encroachment and other informal land use was not just a disorderly and chaotic built environment but was a health risk to both inhabitants and others. As he pointed out, *‘most of the kenkey and fried delicacies brought to the city centres which most of us here have patronized emanate from such unkempt squatter settlements evolving around us.’*

Akoto’s view was that even though low-income informal settlements cannot be ruled out entirely from the face of the built environment, a critical consideration of how these places are evolving should be high on the agenda so as to reduce their growth and their negative impacts on good governance. He said that a key factor that engenders the growth of these undesirable built settlements is the quick provision of state-sponsored utility services and infrastructure facilities. Unauthorised buildings, kiosks, and other unpermitted and wrongly sited structures benefit from these utility services. This is an issue that relates back to previous points such as a national policy and better coordination between MDAs. Akoto’s view was that *‘By denying vital services to initial errant settlers, the urge to develop and reside in these illegal settlements should diminish.’* He suggested that new laws in concert with utility agencies should ensure that *‘new unauthorised buildings, un-permitted business places within our towns and new settlements are denied this vital utility service without which such negative activities and physical structures cannot attract due patronage.’* Akoto (2004) went on to suggest that an *‘iron-fisted’* option has become necessary against the backdrop of prevailing extensive

disorder evident in many new settlements. His view was that *‘When corn mills, music recording shops, block manufacturers, places of worship, drinking bars are mixed-up with residential abodes then what I’ll term a ‘pandemonium of land uses’, a precursor of epidemics and other health risks should be on our hand.’*

The importance of built environment stakeholders was emphasised by Iddrisu (2004) in ensuring the development of sustainable and healthy towns and cities. It was felt necessary for built environment professionals to have the skills for environmental impact studies, balanced development and resource management. However, it was noted that outside the major cities the services of many of the built environment professionals is underused in development projects.

6.1.5 Internal governance and efficiency throughout the sector

Adei (2004) raised the problem of political patronage in the award of contracts, which he said, *‘has been with us for decades’*. Adei (2004) said: *‘I believe one of the greatest disservices of this country is the award of public contracts to incompetent people through political, and the old school mate network. In the first place it is one of the causes of corruption. Secondly, often poor work is done and yet the work gets passed. Thirdly the intended ends are not achieved.’* He suggested that patronage such as this also lead to professionals relaxing standards because *‘they think that they got it by inordinate alliance.’*

Akoto (2004) added that *‘the existing choice-making process of mayors through appointment by ruling governments has been found wanting’*. In many instances he said, *‘local leadership has failed to galvanize local resources and initiatives to achieve desired results’*. Akoto went on to say that: *‘When mayors are elected through the ballot box by the local people, with a clear mandate from the people, with a defined programme of action, backed by a rich knowledge of local problems, and without the ‘Sword of Damocles’ hanging over them by those who appointed them except the people they serve, it is believed that such mayors or district chief executives can produce the desired local*

governance key to creating a positive built-environment.’ In his paper, Iddrisu (2004) asked what the solutions might be to what ‘*appeared like a complete break down of development control in the District and Metropolitan Assemblies*’ and which Adei (2004) said amounted, quite simply, to bad governance.

Dawuni(2004) identified ‘*The single biggest problem facing orderly development of our built environment is indiscipline and lack of respect for the rule of law.*’ He said that ‘*in Ghana our problem is not so much about identifying our problems and prescribing solutions. The problem is ensuring implementation of agreed goals. For a number of reasons, good laws and regulations that could significantly improve the built environment are not being obeyed. Indeed they are often flouted with impunity.*’

He attributed the lack of capacity within the sector and the lack of education or knowledge of the public as the main causes of the poor discipline.

Akoto (2004) illustrated the problems associated with remuneration and conditions: ‘*When experienced senior officers responsible for managing the built environment at the various assemblies earn less than a million cedis (equivalent to approximately US\$100), without a car or housing loan facility, operate from demeaning office places, without official vehicles to monitor physical developments and without prospects of career progression then we have a problem on hand.*’ He pointed out that comparatively, conditions of service for counterpart officials in other state organisation from the Department of Urban Roads, Environmental Protection Agency, Ghana Highway Authority, Lands Commission are so better off that, one wonders how local authority officials continue to survive in such harsh situations. Maybe, he said, ‘*we have at play here the ‘magic’ of the ordinary Ghanaian in making ends meet despite the bad times*’.

Akoto (2004) gave an interesting example of the workload of local officials to illustrate the problems. ‘*For instance in one assembly in the urban areas a senior technical officer handles not less than twenty (20) complaints and petitions in a day, inspects over sixty (60) building sites every month, signs over five hundred sheet documents every week,*

carrys out fifty enforcement actions in a month, and attends over twenty local and interdepartmental meetings in a week!’

As was pointed out by Amoah-Mensah (2004) *‘In situations where public officials are lowly paid and sanctions against the corrupt are mild, one can expect corruption to flourish. However the corruption trend is low in situations with democratic culture, competition, good control systems and effective rule of law.’* Akoto (2004) put forward the view that *‘Some level of corruption within the regulatory departments of the assemblies cannot therefore be ruled out, a situation partially responsible for aggravating the chaotic outlook of the built environment.’*

However, as Amoah-Mensah went on to say *‘Corruption in poor countries tends to be more damaging and undermine the rule of law as well as incentives to invest’* and this reduces the development potential of those countries. Iddrisu (2004) recognised the need to review existing regulation when he asked, *‘In view of our experiences in the past few years is there a need to review current development and building standards – are they appropriate to sustainable development in Ghana at present?’* And in response to the issues of corruption, Iddrisu (2004) also asked if *‘there was a need also to review current administrative systems in the chain of approvals required for physical development to make them more user-friendly and appropriate to the resources available?’*

The effectiveness of the private sector was also questioned by Nico-Annan (2004) when he asked, *“What part can the construction industry play in this and how can contractors assist?”* He said that questions about the effectiveness of the sector are being asked in countries throughout the world. He gave the example of the UK’s “Rethinking Construction”(1998) initiative. He explained that this was the outcome of a study by Sir John Egan and a Construction Task Force made up of leading and senior representatives from the built environment sector in the UK. As Nico-Annan (2004) explained, the Egan Report (Egan 1998) recommended a number of “drivers for change” – defined as key to improving performance. The Driver identified by Nico-Annan (2004) was that of “commitment to people”, as employees of the industry, because the study found that the

construction industry does not recognise that its employees are its most valuable asset and that they need to be treated as such. Nico-Annan's point was that 'people' form the focus of the governance agenda for the built environment sector and he proposed that the construction industry failed to: (i) Respect people; (ii) Recruit well trained people; and (iii) Retain the best people. Nico-Annan (2004) concluded that, *'in order to improve performance construction companies must implement the tenets of good governance in involving people and paying attention to their welfare'*, the focus on 'people' was as valid to government departments and professionals as it was to construction companies. Akwaboah (2004) pointed out the relevance of these issues to professional organisations where problems occur in recruiting and retaining young professionals.

It was commonly mentioned in the 11 keynote papers that legislation was required to set minimum standards for professionals and contractors. The need for all professional bodies, not just the Architects, to be underpinned by regulation was also identified consistently by speakers such as Akwaboah (2004). Dawuni (2004) was one of the Speakers to suggest the involvement of professionals in development control to increase levels of technical competence and help remove political patronage from local development control and decision making. Adei (2004) raised the issue of fee structures and integrity for professionals. He said that *'There are too many bad nuts who are more interested in making money than meeting professional standards,'* going on to say *'It seems the formula of these bad ones is to make a kill as you don't know when you may get the next job.'* Adei (2004) concluded that in his dealings with some members of the professional fraternity he had experienced how *'Some gain by ill-advising you on options with an eye on their pockets; architects who over design projects; engineers who pass sub-standards materials rather than those specified in bids; others who seek to bribe public officials when the odds are against them or approach their political friends to put in a phone call on their behalf.'*

Speakers were also concerned with the efficiency and effectiveness of professionals who came across as key stakeholders in the sector. Akwaboah (2004) said that to remain competitive in the face of a rapidly changing world, consulting firms require:

Professional staff; Office space providing a conducive working environment for staff and clients; State of the art equipment and requisite software. Akwaboah (2004) said that these conditions required considerable financial investment by consulting firms. He said that *'failure to comply with these conditions will result in high turnover of well-trained personnel'*. Therefore, if they are to remain competitive in the International market the adequate remuneration of Consultants is imperative.

As Akwaboah (2004) said: *'The rapid increase in the formation of new consulting firms seems to suggest that the market is very lucrative.'* However, the proliferation of local consultancy firms has naturally affected their growth in size and consequently their performance and earning capacity. He pointed out that the local consulting firms face a number of problems, some self-inflicted and others beyond their control. Some of the problems include the: Small size of firms; Lack of teamwork among local Consultants; Inadequate remuneration for professional services; Lack of protection of local consultants against domination by foreign firms; Inadequate support from Government and lack of legal recognition. On the issue of international and local consultancies, participants subsequently called for regulation of the foreign firms, although no suggestions on exactly what they should be regulated was provided. More flexibility was called for on the part of donor agencies in selecting local professional firms for development projects. Amoah- Mensah (2004) pointed out that funding of projects by donor agencies required open competition to firms from constituent countries of those donor agencies. Consequently, a number of foreign consultancy firms operate in Ghana and, with no rigid laws in the country requiring these firms to register with the appropriate professional bodies, they often operate without the participation of local firms. Amoah-Mensah (2004) argued that this situation created unfair competition for staff, through the payment of higher salaries and better conditions of employment by the foreign consulting firms.

6.1.6 Attitudes as potential barriers to change

Many attitudinal issues were raised by the 11 keynote speakers. Three main themes emerged as follows: (i) Attitudes of professionals towards their clients and the built environment; (ii) Attitudes to enforcement of existing legislation mainly by the public sector and consultancies; and (iii) Attitudes towards a pro-active and planned approach for change

Akuffo (2004) identified how built environment professionals see things differently from, for example economists. Differences in perspective were also highlighted by speakers drawing attention to the way professionals treat clients and the buildings they design and construct. It was felt that professionals needed to win the confidence of clients to overcome the perception that professional services were expensive as indicated by Akwaboah (2004). Other speakers had also identified the attitudes of clients to employ unqualified and informal ‘technicians’ rather than qualified professionals. Akwaboah’s view was that clients did not understand the benefits of employing properly qualified professionals and hence did not see the value in paying professional fees. Whilst the need for proper remuneration of professionals was proposed by Akwaboah (2004), Adei (2004) pointed out that the current fee structure, based on the overall contract sum, leads to what he described as ‘unfair’ practices in layman’s terms. This is an example of two different perspectives on the same issue in which greater clarity and understanding are required. It is unlikely that progress will be made unless attitudes change. There is an important role for the built environment professional bodies to make the public and its potential clients more aware of the role and benefit of professionals. There would appear to be a strong argument for more flexible contract arrangements between professionals and their clients in order to create a more equitable and transparent relationship.

Another problem area for professionals and their clients, particularly domestic/housing clients, is the actual quality of the design. Once again, Adei (2004) describing himself as a layman, in built environment terms, pointed out his surprise that *‘three factors are often ignored in housing design in Ghana: ie Light, Air and the Mosquito.’* This, added to his

observation that *'most houses designed and constructed were often far in excess of actual requirements'* suggesting that professionals ignored basic quality issues. It was recognised that in some ways professionals were following the preferences of Ghanaians for 'ostentatious' and non-traditional buildings and this appeared to lead to conflicts of attitude and approach between 'ostentation' and affordable and functional housing.

It was observed by Akoto (2004) that professionals tended to react more positively to the larger infrastructure projects rather than modest housing projects, therefore appearing to deny Ghanaians the well designed and affordable housing most needed right now. It was stated that, unless professional attitudes change towards designing affordable housing there is little chance of satisfying the current demand.

It was consistently recognised in Speakers papers that public officials had a bad record in enforcing existing rules and regulations, but it was also recognised that the professional had a role to play. It was not good enough for the professional to blame others for the lack of enforcement and corrupt practices, with many taking advantage of the gaps. It was felt that an attitude of 'blame' could be a major barrier to progress.

Another line of thinking was that because of the lack of control and discipline to uphold existing standards, there was often the need to implement 'iron fisted' actions such as the eviction of squatters from informal development. However, Akoto (2004) also said that whilst the situation often demanded it, officials did not like taking this approach and so illegal behaviour such as squatting was not penalised.

Dawuni (2004) identified the conflicting policies and poor discipline in enforcing regulations and Akoto (2004) identified the lack of protection for public spaces and government lands as attitudinal issues that lead to the rapid expansion of informal settlements. Once again, whilst it was recognised that decisions made at the local government level were most influential in regard to informal settlements, it was also felt that professionals had a role to play. The creation of what Akoto (2004) called 'slums' was as a result of a breakdown of governance by government, local authority and

professional decision makers. At governmental level there was a conflict between development control, which is attempting to control development, and the obligation of utility companies to supply electricity and other infrastructure to informal settlers. It was noted that the attitudes of some private sector clients also exploited poor enforcement and low standards throughout the sector. Therefore, there was a need not only for coordination between the different bodies but a change of attitude that would bring about agreements between stakeholders and the consistent application of procedures by government, local government officials, professionals and private sector clients.

Akwaboah (2004) reminded everyone that *‘the success in the implementation of the Public Procurement Act depends largely on us (professionals) and we must not fail the nation.’*

The attitude of professionals and the sector as a whole to change and improvement was identified consistently by the 11 keynote speakers. It was widely recognised that most stakeholders in the built environment were slow to change and the workshop provided a good start for a well planned and open approach. Speakers reinforced the need for professionals to build the trust of government and other stakeholders and be open to collaboration. Professionals were seen as an important link between government and the private sector. Government speakers such as Dawuni (2004) and Iddrisu (2004) confirmed their willingness to open a dialogue with professionals and an apex body representing sector interests. It was generally recognised that the views of all stakeholders had to be included and that this should be led by an agreed vision and collaborative action.

6.2 Comparison of issues with the theoretical governance framework

This section contains an analysis of key governance issues identified by the 11 keynote speakers in their papers and 120 participants in 4 focus group sessions. This analysis is structured around the 4 Components of the theoretical governance framework, namely: Purpose; Key stakeholders; Key drivers; and Capacity

6.2.1 Issues affecting the Purpose component

There are 3 Groups of issues in the Purpose Component of the theoretical governance framework. Two main themes consistently identified by participants were the importance of good governance and the built environment sector as enablers for national development. It was stated by participants that the lack of governance had lead previously to the failure of national development targets and that to achieve the current aims of ‘middle income status’ and the ‘golden age of business’, both Government policy objectives and good governance was essential. The centrality of governance as an enabler for national development was reinforced by one of the keynote speakers who suggested that if governance structures were in place, Ghanaians would be motivated and enabled to make the most of their development opportunities.

The findings therefore reinforce the conclusion drawn (in 5.5.1) that a new Group of ‘National Development’ should be introduced into the Purpose component of the theoretical framework. Whilst there was no adverse evidence found for any of the proposed sub-Groups (see TABLE 2) the main emphasis in the Ghana case study was that of (i) poverty reduction and (ii) economic growth and development.

Several key-note speakers pointed out that whilst the sector had only a small financial impact, its role as provider of infrastructure for other industrial sectors and the provision of housing for people was fundamental in achieving national economic development. It was specifically identified that the built environment sector was not only a catalyst for

development and growth (through investment in housing and infrastructure for example) but also an indicator of the health and wealth of a nation.

It was noted that the built environment sector, as a whole, had its own challenges of leadership and management. Participants said that:

- In underpinning many sectors, as it does, it was recognised that a national policy would be beneficial
- Whilst there was the opportunity for high employment in the sector other participants noted the ‘boom and bust’ nature of construction
- The need to manage high and low tech skills and technologies and the general diversity of the sector
- High levels of corruption, poor contract enforcement and high bureaucratic burden (52 steps for a contractor to get paid) and the cost to the private sector

Evidence from the Ghana case study therefore reinforces the importance of the Sustainable Construction Group in which the issues affecting mainly the demand- and supply-side stakeholders are addressed. In Ghana there is a heavy emphasis on measures needed to attain basic construction standards.

Several participants identified the link between good governance and a good quality built environment. Inadequate land management systems, inadequate development planning, inadequate building control, corruption within local authorities, and lack of local accountability of local government leaders were some of the factors which converged at the urban or settlements level to affect the quality of the built environment in pursuit of sustainable settlements. These findings reinforce the importance of the Sustainable Settlements as a key purpose grouping. The suggested re-grouping (see 5.5.1 above) of Sustainable communities, appears to be relevant to the findings of the Ghana case study although the proposed policy on human settlements is still in draft form.

Changes required in the Theoretical Governance Framework resulting from this analysis will be made in Chapter 7.

6.2.2 Issues affecting the Stakeholder component

There are currently 8 Stakeholder Groups identified in the theoretical governance framework. From an early stage in the preparations for the Ghana case study, the organisers of the national workshop identified just 4 Groups: Central Government; Local Government; Professional bodies and their members; and Private sector.

Participants identified 2 primary functions for Government: that of regulator; and that of Client to the built environment sector. Participants identified the following areas of regulatory influence to include: adequacy of funding for projects; enforcement of rules and regulations by central and local government; capacity on the part of development control agencies i.e. both human and material resources; harmonization and codification of laws affecting the built environment sector; management and coordination of donors. Participants said that there was an over emphasis on sectoral development but with very minimum co-ordination. Participants also identified a role for Government to rationalize the number of organizations involved in the built environment sector to reduce the confusion amongst the public regarding who is responsible for what. In its role as ‘Client’ participants reinforced the need for clarification of responsibilities between Government agencies for both the development and maintenance of built environment facilities. Participants also said that procurement was not a transparent process and it was Government’s responsibility to ensure more effective procurement through the proper application of the public procurement act (ROG, 2003b). Participants also said that Government was responsible for ensuring the enforcement of environmental and social standards to Government funded infrastructure projects.

Participants identified 4 main areas in which Local Government (i.e. Metropolitan, Municipal and District Assemblies) had primary responsibility for the built environment sector, namely: Physical planning; Effective building regulation enforcement;

Transparent land ownership and management control; Regulated land, property delivery and management systems.

Participants noted that Ghana has planning and building regulations both of which are largely based on systems introduced by Britain. There are guidelines (GCS; 2003) covering the submission and approval of plans however, there are numerous examples of informal developments that infringe both planning and building regulations and, due to major skills and staff shortages, these infringements are rarely punished. Corruption is an issue, with opportunities for public servants, professionals and company employees to take advantage of the lapses in supervision and under-resourced institutions. Participants identified specific problems affecting local government in fulfilling their built environment responsibilities. For example, they said that most officials are on secondment; leading to a lack of ownership and interest in local matters. Local government suffers from the same lack of clearly defined roles between central government and the Metropolitan, Municipal and District Assemblies. Participants identified a general 'subservience' of local government to central government and noted that local government lacks the funds to take responsibility for the multitude of functions for which it is mandated. There is a general lack of qualified professionals in the Assemblies but it was also recognized that Assemblies were reluctant to hire the services of professionals. The final point raised by participants was in regard to local governance and accountability. They said that an inarticulate civil society and the lack of local accountability in the election of local authority leaders lead to a breakdown of co-operation in project implementation between the Assemblies and residents of the district.

Participants came from local professional bodies including Ghana Institute of Architects, Institute of Civil Engineers, Institute of Mechanical and Electrical Engineers, Institute of Quantity Surveyors and the Institute of Planners. Participants identified the following roles for professional bodies and their members: Creating high quality consultancies; Assisting the government to implement policies; Applying professional standards to decision making throughout the sector, in whatever role they are employed; Implementing the public procurement act (ROG, 2003b).

Participants identified a range of factors affecting the effective contribution of professionals and their institutes. Of greatest importance was the need to have legal backing to enforce their professional standards. It is still only the Architects who are recognised in law (Architects Decree 1969), all other professional bodies rely on their respective constitutions and byelaws as well as powers established in a more general Professional Bodies Decree (1973). Registration of individuals and firms was required to be undertaken by reputable bodies and the registers have to be kept up to date. There was an all-round need for better cooperation between various bodies including government and clients. Participants also identified the responsibilities of individual professionals employed throughout the sector to act responsibly, maintaining quality control in activities such as selection of materials, design and supervision.

Participants identified a range of problems associated with professional fees. On the one hand they said that professionals are under valued and need a minimum fee scale but also professionals need to be more flexible in their fee arrangements to demonstrate value-for-money to clients and also to accommodate new forms of contract.

Participants had mixed views about private sector stakeholders. For example, they said that the private sector was often criticised as the cause of, or as main exploiters of, poor governance. Some participants suggested that it was foreign firms and indiscriminant developers who were most often the cause. However, some recognised that the private sector also suffers most from corruption where it was pointed out that many firms budget for its inevitable cost.

One key-note speaker focussed on the way that contractors could improve their governance performance by improving employment conditions and site working conditions for the people they employ.

Participants identified four roles for the private sector: Providing proper welfare facilities for employees; Creating healthy and safe working conditions on site; Encouraging life-

long learning and career improvement; and Accepting greater diversity in their work forces

In addition, participants also identified areas of product improvement and application of research outputs in which they felt the private sector could play a stronger role. They also identified the need for small consulting and manufacturing firms to play a stronger role in quality improvement and therefore raising the rather low expectations of their clients.

Interestingly, the ‘private sector focus group’ identified several actions on behalf of Government to better regulate the private sector. The measures they prescribed included the following: increase private sector participation in public sector decision making; improve accountability and transparency and the speed of approval for project review and procurement processes; simplify the fragmented regulatory environment involving different agencies, for example: Environmental Protection Agency, Metropolitan, Municipal and District Assemblies, Local Valuation Board; and improve payment procedures to Contractors.

Finally, participants note that the private sector profit and risk motive is not always understood by public sector employees which means that different rules apply and problems arise due to lack of transparency and understanding on both sides.

In addition to the 4 main stakeholder groups identified above participants also identified important roles for international organizations such as donor agencies, contractors, professional bodies and consulting firms. Whilst the conclusions drawn by participants in this case study and those drawn in the analysis of Chapter 5 are sometime contradictory, there is no doubt that international organizations are important stakeholders for Ghana’s built environment sector. For example, donor agencies provide considerable funding for major infrastructure projects and demand achievement of environmental and social standards. Large international contractors operate in Ghana in their own right or through major subsidiaries such as Taylor Woodrow (UK) (Taysec), Skanska (Sweden), Tasei Corporation (Japan) and Sonitra (Israel). They employ local contractors and personnel,

the vast majority of whom are sole operators and largely ‘informal’. Professional bodies are registered with international professional bodies such as the CAA (Commonwealth Association of Architects), UIA (International Union of Architects) RICS (Royal Institution of Chartered Surveyors, RIBA (Royal Institute of British Architects). CIOB (Chartered Institute of Building). International consulting firms freely bid for work advertised by donor and government agencies. They compete with local consultancies and professionals but also bring skills and competencies which aid skills and technology transfer.

Interestingly, whilst earlier analysis has identified the importance of informal traders and their unions, there was no direct reference by participants to this stakeholder group.

Some keynote speakers highlighted the responsibilities of individual decision makers, particularly those in high office. They suggested that: (i) the President should be held accountable for constitutional order especially in respect to human rights; and (ii) Local decision makers/leaders should be held responsible to respect the agreed guidelines and set standards for human settlement development, which it was felt was mainly applicable at the local and community level.

The concept of individual stakeholder has not so far been recognised in the theoretical governance framework. It has, so far, only been raised by participants in the Ghanaian case study.

Changes required in the Theoretical Governance Framework resulting from this analysis will be made in Chapter 7.

6.2.3 Issues affecting the Key Drivers component

The third component of the theoretical governance framework is Key drivers comprising the measure that effect change including policies, regulations, market forces, standards,

government facilitation and enforcement. Participants drew attention to issues primarily concerned with regulation and government facilitation and enforcement.

One of the primary concerns for professionals was the ‘regulation’ of professional firms and contractors including foreign firms operating in Ghana (Although there were no suggestions on exactly what they should be regulated on). Whilst participants lauded the potential role of individual professionals in raising standards in the sector, their main concerns were for legal backing of professional bodies to enforce professional standards and behaviour. Participants also identified the role of Government in facilitating more appropriate, less bureaucratic procedures as well as requiring more flexibility by donor agencies in selecting local professional firms for development projects. The latter point appeared to be a measure protecting the interests of local firms.

A market-based issue was that of acceptance of affordable housing standards rather than the promotion of ostentatious standards demanded by Ghanaian housing clients. Participants identified the need for appropriate standards for Ghana including development measures that are relevant to people and the built environment sector. However, the market currently appears to be ineffectual as a driver for sustainable development.

Perhaps the single most repeated point made by many speakers was that regulations and standards already existed, the need was not for more rules and regulations but for the existing ones to be enforced.

Analysis of the Ghana case study therefore suggests that all 6 Groups of the Key Driver component of the theoretical governance framework are relevant. No changes are envisaged for the theoretical governance framework as a result of this analysis.

6.2.4 Issues affecting the Capacity component

There are 4 Groups in the Capacity Component of the theoretical governance framework. Consistently key-note speakers and participants stated the need for improved capacity throughout the sector particularly in the areas of: skills, working conditions and environments, systems and processes, leadership and management.

As Dawuni (2004) pointed out *‘Many institutions simply lack the capacity to perform their allotted roles. Municipal and District Assemblies which have statutory responsibility for planning and development control simply are not up to the task due to lack of resources – human and material.’*

The role of professionals has emerged as central to the performance of the Ghanaian built environment sector and speakers reinforced the need for measures that developed the full potential of built environment professionals. However, Dawuni (2004) recognised the lack of ability for the public sector to attract young people into the sector because of better conditions of service in a competing private sector. It was noted how there were differential rewards between the private sector, the central government agencies and local authority. He called for innovative ways in which they can be assisted since the resources are simply not there. One suggestion was for professional bodies to get their members onto the approval committees of the District, Metropolitan and Municipal Assemblies.

Two other groups were identified as special groups in which capacity was to be strengthened, namely: The public sector – critical in the role of governing the development process; and People – as employees throughout the sector

Speakers identified a wide range of, what can be described as, ‘behaviour characteristics and enabling environments.’ For example, the need for accountability in public sector and corporate bodies implies the need for behaviour which can be accounted for as well as the environment in which accountability can be achieved. The need for constructive dialogue implies the need for behaviour which allows dialogue as well as an environment which enables dialogue. In both cases there needs to be a capacity for ‘accountability’ and

‘constructive dialogue’ which is dependent on the capacity to create enabling environments and stakeholder capacity to behave in the desired manner. Participants identified many gaps in the Ghanaian built environment sector in which the desired accountability and constructive dialogue are either simply not possible or severely hampered. For example, the lack of accountability between Assembly Heads and their local communities, the heavy workload of local authority officers and the lack of formal consultative mechanisms and Apex bodies for policy development with government.

Participants highlighted the importance of leadership, already a sub-Group of Capacity Group 4, and de-politicisation of decision making, not recognised so far in the theoretical governance framework. They also identified the importance of all 4 Capacity Groups identified in the theoretical governance framework, namely: (i) Cultural capacity to effect change; (ii) Performance management capacity for effecting policy, education and regulation; (iii) Technological capacity including adequate equipment and personal; and (iv) skills for leadership, controlling and communicating.

Interestingly, participants did not make direct reference to the need identified for ‘Financial’ Capacity (5.5.4) for small and medium sized businesses in the sector. However, there was a recognition that government should set up practices to pay contractors and consultants on time to avoid unnecessary financial hardship, therefore implying the need for adequate financial capacity.

Changes required in the Theoretical Governance Framework resulting from this analysis will be made in Chapter 7.

CHAPTER 7

Conclusion

Research findings and policy implications

CHAPTER 7 concludes the research study by: (7.1) Concluding the relevance of a governance framework to built environment policy makers and practitioners (Research Objective 3) and its relevance as a mechanism for effective analysis and decision making for improved performance in the built environment sector (Research Objective 4); (7.2) concluding the effectiveness and application of the governance framework to achieve the overall Aim of the project: *‘To develop a Governance Framework that enables policy makers and practitioners to improve performance for sustainable development in the built environment sectors of developed and developing countries’*; (7.3) considers further development and potential for the Governance Framework; and (7.4) provides a final output to purpose review of the research project.

Chapter 7 contains the final outputs expected from the project (1.4.3), namely: The Governance Framework; Guidance on how to use the framework; and how its application can be extended with further research and development.

7.1 The Governance Framework

This section concludes the tests for global applicability (Research Objective 3), aiming to demonstrate the relevance of the developed governance framework to effective analysis and decision making in the built environment (Research Objective 4) by reviewing and drawing conclusions from the results of tests with (7.1.1) existing governance arrangements in Ghana and the UK (from Chapter 5); (7.1.2) preferences stated by built environment policy makers and practitioners (from Chapter 6)

7.1.1 Relevance to existing governance arrangements in Ghana and the UK

The review and analysis (Chapter 5), of arrangements currently in place for achieving the built environment sectors of UK and Ghana, provided the first test of the theoretical governance framework developed in Chapter 4. The conclusion of the analysis (Section 5.5) showed that with the exception of a few gaps, the current arrangements for both UK and Ghana were well represented in the key components of the theoretical framework.

One gap, emerging from both the UK and Ghana case studies was the lack of ‘National Development’ in the Purpose component. The comparative analysis of policies, regulations and programmes, targeting the attainment of sustainable development at a country level, provided an indication of the potential for performance improvement. The national sustainable development agenda therefore emerged as a critical factor in determining the extent of arrangements encouraging sustainable development in the built environment sectors of both Ghana and the UK. Therefore, it is proposed that the Governance framework includes a new Group of ‘National Development’ in the Purpose Component.

The second gap identified in the analysis was that of ‘Sustainable Communities’ as a key group also in the Purpose Component. This was largely as a result of the importance attached to sustainable communities rather than ‘sustainable settlements’ in the UK sustainable development strategy (UKGOV, 2005). There were no adverse indications of this change in the Ghana case study and so it is proposed to change the hierarchy making ‘Sustainable Communities’ one of 4 main Groups of the Purpose Component.

The third gap identified in the analysis was that of Financial Capacity. This was found to be a particularly important factor in the Ghanaian case study. The lack of financial capacity was a key inhibitor of performance for Government (to pay contractors), local government (to pay employees) and private sector (to fund investment and maintain assets). It is therefore proposed to introduce a new Group entitled ‘Financial Capacity’ into the Capacity Component.

7.1.2 Relevance to built environment policy makers and practitioners in Ghana

Chapter 6 contains the results of a contingent valuation in which the preferences of Ghana’s built environment professionals are compared with the theoretical governance framework. In stating their preferences, participants in the case study identified areas of the governance framework that are of greatest importance to Ghana’s built environment sector. Section 6.2 contains the analysis and conclusions.

In the case of the Purpose Component, the findings reinforced the conclusion drawn (in 5.5.1 and 7.1.1 above) that a new Group of ‘National Development’ should be introduced into the Purpose component of the theoretical framework. The main emphasis in the Ghana case study was that of (i) poverty reduction and (ii) economic growth and development.

The case study also reinforced the conclusion drawn (in 5.5.1 and 7.1.1 above) for re-naming the ‘Sustainable settlements’ Group to ‘Sustainable Communities’ in the Purpose Component of the framework.

Evidence from the Ghana case study reinforces the importance of the Sustainable Construction Group in which the issues affecting performance improvement in both demand- and supply-side stakeholders are addressed. In Ghana there is a heavy emphasis on measures needed to attain basic construction standards.

In the case of the Stakeholder Component, participants identified 2 primary functions for Government: that of regulator; and that of Client to the built environment sector. There was an overriding concern that Central and Local Government lacked clarity of roles – but remained the primary policy makers and regulators. Professionals are potentially influential but the lack of legal backing to enforce their standards. People as individuals in high office, as employees and representatives of communities were also recognized as important stakeholders. As a result of the importance attached to ‘individuals’ in the Ghana case study, an Individual stakeholder Group was introduced to the framework and Informal Traders (previously assigned their own Group) were transferred to a Sub Group.

In the case of the Key Drivers Component, participant’s primary concern was for regulation. Perhaps the single most repeated point made by many speakers was that regulations and standards already existed, the need was not for more rules and regulations but for the existing ones to be enforced. It was noted that with few exceptions, the existing rules and regulations affected only basic levels of construction rather than encouraging sustainable development in the built environment sector. Furthermore, the lack of a market for sustainable development from demand-side stakeholders, including Government as a major client, means that additional regulation is needed to encourage either: (i) increasing demand from demand-side stakeholders; or (ii) higher standards of supply from supply-side stakeholders.

Interestingly, there was little evidence of ‘ethical’ considerations beyond stating the importance of built environment professionals in improving standards and highlighting the role corruption played in the overall performance of the sector. There was a general conclusion that if key drivers such as policies, laws and enforcement mechanisms were in place, corruption would be less likely, therefore supporting the decision not to create ‘ethics’ component in the governance framework.

No changes to the theoretical governance framework are envisaged from the analysis.

In the case of the Capacity Component, participant's identified many gaps in the Ghanaian built environment sector in which the desired accountability and constructive dialogue are either simply not possible or severely hampered by lack of capacity. For example, the lack of accountability between Assembly Heads and their local communities, the heavy workload of local authority officers and the lack of formal consultative mechanisms, such as Apex bodies, for policy development with government. Participants also highlighted the importance of leadership, already a sub-Group of the Capacity Component, and de-politicisation of decision making not recognised so far in the theoretical governance framework. Whilst the latter point was not explored in detail, it might suggest a more objective, or normative, approach to decision making could be beneficial in Ghana. Issues associated with decision making and management are therefore considered in the Performance Management Group of the Capacity Component.

7.1.3 Concluding the relevance of the Theoretical Governance Framework

The theoretical governance framework has been systematically constructed (Chapter 4) and tested (Chapters 5 and 6) for relevance to existing governance arrangements and the preferences of policy makers and practitioners . The structure of the framework is based on 4 Components with a range of Groups and sub-Groups identified for each Component. Whilst the sub-Groups, which emerged from the original analysis in Chapter 4 (see TABLES 2, 3, 4 and 5) have not been rigorously tested in the validation process carried out so far, the basic structure of 4 Components and various Groups has stood up well.

Adaptations to the theoretical governance framework have been identified by the analysis in Chapters 5 (UK and Ghana) and 6 (Ghana policy makers and practitioners), as follows:

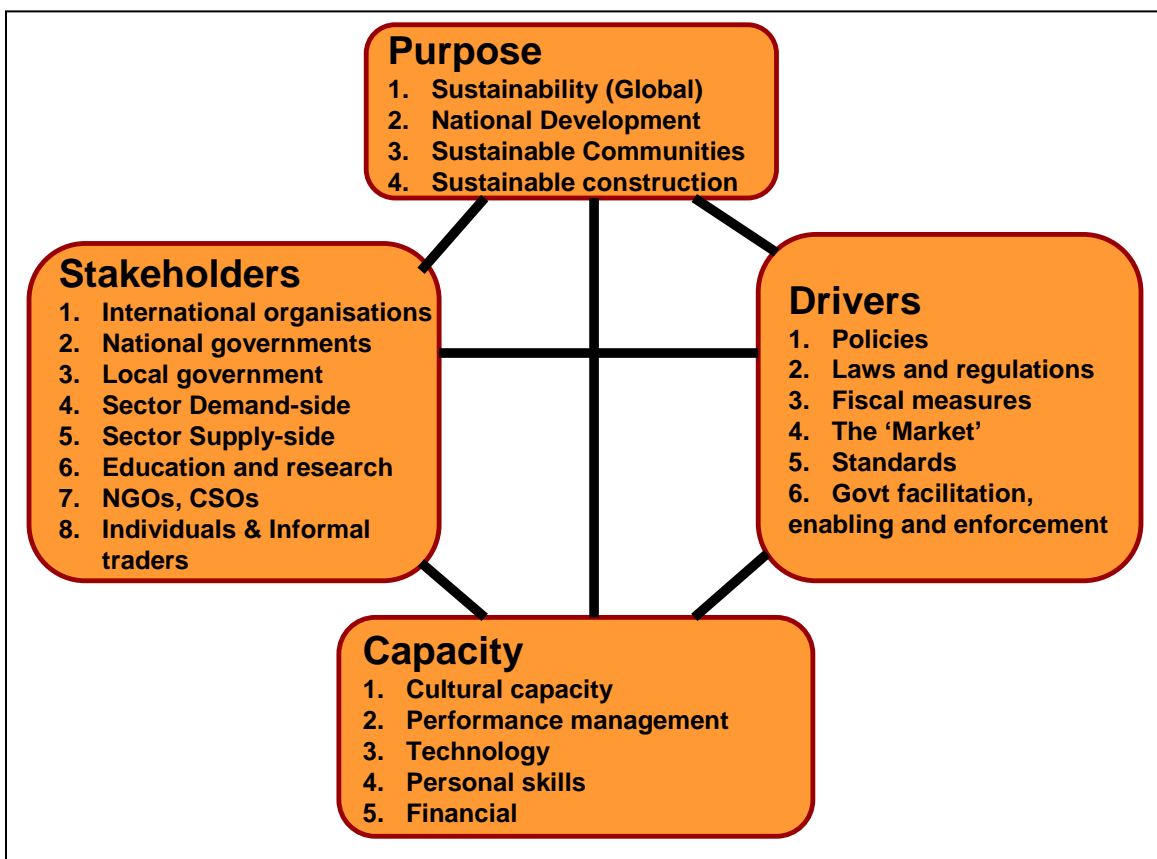
1. Introduction of a new 'National Development' Group to the Purpose Component
2. Re-naming of the 'Sustainable Settlements' Group to 'Sustainable Communities' to provide recognition of a wider agenda
3. Introduction of a new 'Individual stakeholder' Group in the Stakeholder Component

4. Introduction of a new 'Financial capacity' Group to the Capacity Component.

Therefore, Figure 10, with the adaptations noted above, sets out a Governance Framework that has demonstrated its relevance to the existing governance arrangements the preferences and ethics of policy makers and practitioners in the case study countries and therefore provides a framework in which performance can be analysed and improved.

No attempt has been made to quantify or describe the levels of attainment required in each Component and Group although initial observations on their relative importance are presented in 7.3 below.

Figure 10: The Theoretical Governance Framework - Post validation



7.2 Effectiveness and application of the Governance Framework

The relevance of the governance framework to existing governance arrangements and the preferences of policy makers and practitioners were demonstrated in 7.1 above. In 7.2 we conclude the effectiveness of the governance framework as a mechanism for analysis and decision making to improve performance.

The theoretical governance framework as presented in Figure 10 provides a robust framework in which performance can be analysed.

At its simplest, the main Components and Groups of the theoretical governance framework provide a framework in which to map out, compare and analyse existing governance arrangements. Applying a simple check-list approach can provide basic analysis and benchmarking outputs, identifying gaps in the framework and indicating possible areas for development.

The Governance Framework as developed in this project, has been used in this way by the Author to analyse existing governance arrangements in Ghana, Liberia and Ethiopia.

The method comprises:

- 1 Review of literature to determine current arrangements including: policies, laws, institutional structures, stakeholder engagement and capacity levels.
- 2 Mapping onto the Framework to identify gaps in the framework (see 7.3 for discussion on possible ‘weightings’ of each Component) (in practice the governance framework is used with other ‘framework’ documents such as institutional and regulatory framework documents appropriate to specific sectors)
- 3 Carrying out further analysis on the gaps, usually involving fact-finding interviews and consultative workshops with key policy makers and practitioners to validate findings from the literature provided and identify local practices and preferences that need to be considered.

- 4 Carry out further consultation to identify opportunities for and barriers to implementation.
- 5 Draft out proposed improvement measures which may include measures such as the development of policies or regulations, restructuring of organizations, introduction of management systems and strengthening of capacity in key areas.
- 6 Review the proposed improvement measures on the framework to ensure all gaps are addressed.
- 7 Use the framework as a presentational tool with the client to illustrate the extent of development necessary, the reasons for the measures proposed and indicate areas of impact. Using the framework in this way has the added benefit of building understanding with the policy makers and practitioners who will be involved in the development activities.
- 8 Present proposals to Client for approval
- 9 Develop implementation plan and implement

In practice, it has been found that a simple framework tool as developed in this project provides a highly effective mechanism for different policy makers and professionals to learn about complex governance arrangements, build their own understanding, engage effectively in formulating solutions and make the case to other authorities for funding and implementation support.

Whilst the governance framework has been developed with sustainable development in mind the research showed how, particularly in developing countries, it was more likely to address fundamental issues of construction planning, regulation, management and delivery to reach basic construction performance standards of time, cost and quality, let alone aiming to reach the more complex expectations of sustainable development.

It was also identified in the research that, in developing countries, these guidelines particularly affect the public sector which, on behalf of Government, is the primary authority developing and implementing policies and regulations affecting the built environment sector. This has been borne out in the Author's recent experience in

developing countries where Government is the primary author and facilitator of key policy documents that, within national development objectives, also set out key performance objectives for the built environment sector (FDRE, 2006; ROG, 2005b, 2008b, 2009 and ROL, 2008 and 2009). As a result, measures to improve performance are largely focused on public sector reform and capacity building (FDRE, 2007; ROG 2003a, and 2004; ROL, 2009a, b and c). However, the literature also shows how, in developed countries like the UK, it was the Government that instrumented the process of establishing sustainable development policies and implementation mechanisms for the sector (UKGOV, 2000 and 2004). Therefore, the importance of Government to improving performance for sustainable development is reinforced in the case of both developed and developing countries. Furthermore, whilst ‘governance’ is seen as distinct from ‘government’ (Heywood, 2002), it falls to Government to create the conditions in which a comprehensive governance framework can be fully developed.

Also, whilst these guidelines were developed for the built environment sector, the 4 Components of the framework are generic and can be applied to other sectors. For example, in Liberia, whilst the main area of interest with the Ministry of Public Works is the built environment sector, it has been necessary to work with the Governance Commission on wider ranging reform and the framework, along with other analytical tools (Gilham 2010a and b) is providing a basis for this wider analysis and review.

The Governance Framework as developed therefore appears to satisfy:

- Research Objective 3, to: *ensure its global functionality and relevance to built environment policy makers and practitioners*
- Research Objective 4, to: *demonstrate the relevance of a governance framework as a mechanism for effective analysis and decision making to improve performance in the built environment sector for sustainable development*
- And the overall Aim of the project to: *develop a Governance Framework that enables policy makers and practitioners to improve performance for sustainable development in the built environment sectors of developed and developing countries*

7.3 Potential for further development of the Governance Framework

The Governance Framework as developed provides a useful basis for analysis and decision making. However, during the research process other areas for further development and extension of use have been identified as follows:

7.3.1 ‘Weighting’ of the Components and Groups

Whilst the research has not attempted to determine levels of attainment required in the Components and Groups, evidence from the case studies suggests that some components of the governance framework may be more important than others. Whilst it is anticipated that further research would be required to fully test this conclusion, preliminary findings are set out below:

Component 1 - Purpose: A clearly stated vision, as expressed in policies and strategies, was shown in the literature to demonstrate leadership and intent, mainly on behalf of Government but some corporations were seen to demonstrate leadership by their early declaration of sustainability strategies, etc, In the case of the UK Government’s declaration of intent in their sustainable development strategies (UKGOV, 1999 and UKGOV, 2005) and subsequent Sustainable Construction Strategy (UKGOV, 2000a), sector stakeholders were able to combine and coordinate their efforts which, over a period of 10 years have gradually influenced demand and supply-side stakeholders to integrate sustainability into built environment performance targets.

Therefore a clearly stated purpose, in the form of a Vision, Policy or Strategy, demonstrates leadership and appears to be a clear indicator of, at least, the potential for improved performance. The indicator appears to be equally valid in both developed and developing countries, and the different approach of Governments in Ghana (particularly the lack of a sector vision) and the UK towards sustainable development in the built environment sector provides us with a clear indicator of differential performance.

Component 2 - Stakeholders: Good governance requires the involvement of stakeholders from Government, the private sector and civil society. The UK case study demonstrated how wide ranging stakeholders are involved in the various functions of policy formulation, regulation and implementation in the built environment sector (SDC 2006, SBTG 2004). There are less stakeholders actively engaged in Ghana for several reasons: (i) Government ministries, agencies and departments tend to carry out all of the major functions of policy, regulation and implementation, although in recent years construction of the works tends to be contracted out to the private sector; (ii) Civil society and private sector organizations are less well formed and often poorly resourced, thereby limiting their impact and effectiveness; (iii) There are few formal mechanisms for involvement of non-governmental organizations in the functions of policy formulation and regulatory development.

It is perhaps the latter of the three factors which is most critical. The case studies provide a stark comparison, not only in the number of stakeholders involved in the various policy development and implementation processes, but in the formal mechanisms available for involvement. For example, the UK has a wide range of consultative mechanisms in which built environment stakeholders are involved in various policy formulation and regulatory developments. Until recently there were only limited formal mechanisms established for stakeholders in Ghana's built environment sector to consult with Government on policies that affect the sector. In fact, the need for an Apex body to represent the built environment sector was an important conclusion drawn by participants at the national workshop on Governance and the built environment sector held in Accra 2004 and reported in Chapter 6.

In Ghana there is however, increasing evidence of stakeholder consultation being sought by Government. For example, Government has recently introduced the requirement to carry out Strategic Environmental Assessments on all new policies and this gives stakeholders a new opportunity to participate in such assessments. Structured consultations, including regional and national workshops, have also been held for the recently completed National Transport Policy (Nathan, 2006, ROG 2006c.). Furthermore,

in the preparation of the Draft National Development Plan (ROG, 2008) facilitated by the National Development Planning Council (NDPC), considerable stakeholder consultation has taken place.

Therefore, the number of stakeholders involved in policy formulation would appear to be an indicator of potential performance improvement. The need to clarify functions in Ghana's public sector has also been well documented (Dawuni, 2004, ROG, 2005a, 2007b, 2008a and 2009) as a means of improving performance in the built environment sector. The degree to which functions are separated between stakeholders also appears to be an important indicator of potential performance improvement, especially evident in policy and project implementation.

Component 3 - The Key Drivers: A range of Drivers have been identified in the Governance Framework. Whilst all of them contribute to a comprehensive approach to sustainable development some appear to be more critical than others. For example, government policy, national laws, regulations and enabling measures.

In the UK, Government and its agencies (EA 1999 and 2002) have been promoters of improved performance for sustainable development in the built environment projects that they have commissioned. In Ghana, Government projects are known for their failure to include environmental standards and, through poor management and supervision of the works, consistently reward poor contractor performance (Adei 2004, Sam 2005, Gilham et al 2007, ROG, 2008a). Furthermore, the failure to enforce even basic standards of planning, highways design and building regulations has led to consistent collapses of buildings and premature rehabilitation costs for roads. The formula used for prioritizing investment in Ghana's roads is simply not economically sustainable and affords little concern for environmental and social impacts (WSP, 2006).

The lack of a well trained and resourced private sector affects performance of Ghana's built environment sector in several ways. One of which is to limit the effectiveness of competitive bidding as there are a limited number of competent contractors available for

major projects. Another is the lack of application of ‘market forces’ and therefore Ghana lacks the driving force of a ‘market’ demanding higher performance standards.

The absence of effective market forces means that government regulation becomes increasingly important as a key driver for performance improvement and sustainable development. Therefore, Government policies, national laws and their enforcement are critical sub-groups of the Key Drivers component and they become important indicators of potential performance improvement.

Component 4 - Capacity: In the analysis of interdependent policy, governance and institutional frameworks, capacity emerges as a critical component in all three.

Evidence shows how the lack of capacity can lead to poor performance and failures even where institutions and regulations are in place. The analysis shows how gaps in each of the Groups of the Capacity Component can have a significant impact on performance for sustainable development. Of particular interest for developing countries are the gaps identified in the Ghanaian case study, namely: gaps in the cultural capacity to apply new paradigms and bring about change; gaps in performance management such as the ability to strategise and formulate policies and regulations, and consistently implement, enforce, monitor and evaluate performance; gaps in technology including shortages of hardware, software and know-how; gaps in the knowledge and skills of individuals, particularly in the areas of leadership and management; and finally shortages of financial resources including the ability to raise finance at realistic costs.

Capacity, therefore becomes an important indicator of the potential for performance improvement. Usually treated as the last piece in the jigsaw, satisfied by training or resource acquisition, it appears that the lack of capacities for policy formulation, change and strategising could be the first barriers that need to be addressed in the process of performance improvement.

Therefore, in summarizing the observations made above a list of priorities emerge as follows:

- In the Purpose Component it is simply the lack of a common Vision which is the single most important factor affecting performance.
- In the Stakeholder Component there are two issues affecting performance: a lack of stakeholders involved in formulation of policies and regulations and a lack of functional clarity of organizational roles and responsibilities which affect the formulation of policies and particularly the effective implementation of plans and programmes. Government appears as the primary mobiliser and enabler in developed and developing countries.
- In the Key Drivers Component, four of the Groups are of special importance, namely: Policy documents: Laws and regulations; Market forces; Enforcement mechanisms; and procedures for formal stakeholder facilitation and consultation.
- In the Capacity Component, gaps in all five Groups can cause problems, namely: Gaps in capacity for change, re-orientation, strategizing, formulating policies and plans; Gaps in capacity to manage, monitor and enforce; Gaps in technology; Gaps in general knowledge and skills; and Gaps in finance.

7.3.2 Interactions and inter-dependencies between components and groups

One notes also how the different Components and Groups have cause and effect relationships. For example, a lack of Vision (Purpose Component) may be caused by a lack of capacity for 'vision-making' (Capacity Component), a lack of stakeholders available (Stakeholders Component), a lack of demand for visioning (Key Drivers Component) and/or a lack of formal mechanisms in which to formulate a vision (Key Drivers Component).

The extent of these interactions has not been explored in the limited resources of the study. However, determining the full extent of cause and effect relationships between the

different Groups and Components would be an interesting area of future research which could also be derived from empirical evidence collected in further case studies.

7.3.3 Governance as an indicator of Sustainable Development

As was determined in the early stages of this study, Sustainable Development is both an output and a process. The process is concerned with decision making involving multi stakeholder interests to identify the most appropriate economic, environmental and social development solutions. Whilst not the primary concern of this research, the literature and case studies has revealed fundamental differences in the objectives for, and practice of, sustainable development between developed and developing countries. The literature and case studies have consistently demonstrated how the lack, or failure, of key governance components affects performance. For example, the lack of policies, regulations and enforcement capacity in the Ghanaian case study account for significant shortfalls in the attainment of basic quality standards let alone the attainment of sustainable development. Conversely, the comprehensive framework of policies, laws and regulations in the UK both compel and enable key stakeholders in the built environment sector to address complex sustainable development issues.

The stark differences exposed in this study suggest that a weak or inadequately developed governance framework could be THE single most important differentiator in performance of developed and developing countries and therefore a potential indicator of the built environment sector's ability to achieve sustainable development.

However, identifying the 'weak' or 'inadequately developed' parts of the governance framework, particularly the degree of their weakness, may pose a difficult challenge.

Interestingly, in describing their experiences in identifying 'weak' spots in the governance realms of 16 developing countries, Hyden et al (2003) explain the difficulty of isolating the cause and effect of changes in the multi-dimensional governance environment. However, they go on to identify some key issues affecting governance performance which closely align with the priority areas identified in 7.3.1 above. For

example, they confirm that a major governance problem is where formal rules are replaced by informal practices. Hyden et al (2003) say that in all cases where Government officials are not hired or promoted on merit, where judicial authorities are not immune to bribes; governance principles such as fairness, transparency and accountability are violated. They say that ‘softness’ on adherence to rules tends to have the most dramatic effect on the overall governance assessment.

Hyden et al (2003) go on to identify two distinct governance challenges, both of which appear to be reflected in the items listed above from analysis in 7.3.1 as follows: (i) design of rules and (ii) adherence to rules. The former item indicates the importance of the Purpose, Stakeholder and Capacity Components that enable policies, laws and regulations to be developed and the second item indicates the importance of the Key Drivers Component to enforce policies and regulations. They conclude that some components are essential for the overall attainment of good governance and affirm the particular importance of components associated with the rule of law.

Whilst authors like Hayden et al (2003) and Kaufmann et al (2006) warn against over-reliance on a small number of governance indicators, the early identification of this priority indicator set is an interesting outcome from the research.

7.3.4 Further research and uses of the Governance Framework so far

More research is required to build a greater understanding of the relative importance of the Components and Groups identified in the theoretical governance framework. However, as understanding builds of the relative importance, particularly in regard to their relative impact on behavioural change of both demand and supply-side stakeholders, the framework has the potential to provide a more sophisticated analysis of governance arrangements currently in place, along with better identification of priority areas for improvement and consequently more useful policy and management guidance for a wider range of built environment stakeholders.

The theoretical governance framework as developed provides several research opportunities. The first area that may be considered is further testing of the theoretical framework for global applicability with other countries. This could simply utilize the existing framework to carry out validation case studies in countries similar in character to the UK and Ghana, or it could comprise a parallel research but using literature available in other languages such as French, Spanish, Chinese and Russian. Comparisons of structure and composition resulting from the different cultural emphasis would be very interesting outcomes; validation could be carried out by case studies.

The second potential area of research interest would be in quantifying the relative importance of the Components, Groups and sub-Groups contained in the framework. Empirical studies could be carried out to determine stakeholders perceptions of importance; identifying areas of conflict and synergy between stakeholder groups throughout the built environment sector.

The third potential area for research is to explore the range of cause and effect relationships between the Components, Groups and sub-Groups. This would assist policy makers to ensure investment in reform was used effectively and ensuring sufficient resources were available to improve all related components.

The Ghanaian case study also demonstrated two practical applications of a governance-led approach. In the case of the National Transport Policy (ROG 2009) the governance framework was used to explain the link between issues of policy, regulation, institutional reform, management and capacity building, which often appear disparate to stakeholders concerned only with transport infrastructure. The concept of integrated policy, governance and institutional frameworks was embedded in the policy document. The centrality of governance and the establishment of a governance framework as a core component in Government policy is a clear indicator of its relevance to, and application for, performance improvement in the built environment. Specifically, it has provided a framework in which policy, institutional and capacity issues affecting Ghana's road

builders have been set out and systematically addressed in development funding programmes (EU, 2006b and WB, 2009).

In the case of the national governance workshop involving over 120 built environment professionals, the governance framework provided a framework for participants from both public and private sectors to explore the relationship between their sector and the national objectives for development and good governance. Inter-profession rivalries were neutralized in pursuit of a common cause, namely improved governance for national growth and development.

Both examples demonstrate the practical application of both a ‘framework’ and ‘governance’ led approach to analyse, review and improve performance in the built environment sector.

The governance framework is now being used to review past performance and propose performance improvements in Liberia’s Ministry of Public Works (Gilham, 2010a and b) and Ethiopia’s Ministry of Works and Urban Development and the Ethiopian Road Authority.

7.3.5 Potential for replicability and global application

The theoretical governance framework as developed and tested in this project appears to be widely applicable.

As was determined in the literature, all sectors and all organizations have a governance framework in which they operate. Therefore, whilst this theoretical governance framework has been developed with the built environment sector in mind, it can be adapted and applied to other sectors of the economy.

However, the most important consideration for this project is its ‘replicability’ in built environment sectors in developed and developing countries.

The conclusion is that the basic structure of the theoretical governance framework comprising of four key components, groups and sub-groups is widely applicable. Variations may be required to reflect prevailing economic, environmental and social conditions in different countries although the comparative analysis between the UK and Ghana suggests that the range of components, groups and sub-groups of the framework apply to countries in different states of economic development.

On the basis that the case studies were carried out in the UK and Ghana it is considered most likely that the theoretical governance framework developed in this project will be readily applicable in countries that can be described as western polyarchies; as found in North America, Europe and Australasia. There seems to be no reason why the framework should not apply to the various democracy models such as the Westminster model or Consociational democracy (Heywood, 2002). Evidence suggests that the governance framework will be well populated in these countries.

As previously identified (CACG, 1999), British Commonwealth countries share many legal and structural characteristics making them suitable for application. Therefore, as evidenced by the Ghanaian case study, the framework is applicable to other English-speaking, post-colonial, emerging democracies and aspiring polyarchies such as Botswana, Kenya, Nigeria, Sierra Leone, South Africa, Tanzania, Uganda and Zambia (to name the larger countries only). Evidence of public sector reforms underway in countries such as Liberia and Ethiopia also indicate the potential for its application in these countries. India is an interesting example which has a strong use of the English language and has functioned as a polyarchy since its independence from Britain in 1947. As evidenced by comparative surveys such as Transparency International (TI, 2003 and 2005) and World Bank (WB, 2003) the governance framework could provide a valuable framework in which to analyse performance and identify priority areas for action.

Recognition must be given to factors such as different constitutions and legal frameworks, national cultures, philosophies and language may exclude its use in some

countries. It is noted that, the theoretical framework is untested in East Asian democracies, Islamic regimes and various forms of authoritarian regimes. Its application has only been tested in countries where English is the formal language of the country.

7.4 Research output to purpose review

This Section completes the conclusions by briefly reviewing the overall success of the research project in regard to answering the Research Aim (1.4.1) and Research Objectives (1.4.2)

The Research aimed to: *develop a Governance Framework that enables policy makers and practitioners to improve performance for sustainable development in the built environment sectors of developed and developing countries.*

The Research Objectives, reflecting the milestones needed to systematically progress towards the Research Aim, are to:

1. Systematically demonstrate that: Governance is an integral component of the sustainable development agenda; The built environment sector is integral to the achievement of sustainable development; Governance is an integral component of performance in the built environment sector
2. Construct a theoretical governance framework for sustainable development in the built environment sector, suitable for developed and developing countries
3. Test the developed framework to ensure its global functionality and relevance to built environment policy makers and practitioners
4. Demonstrate the relevance of a governance framework as a mechanism for effective analysis and decision making to improve performance in the built environment sector for sustainable development.

Following a thorough review of the literature on sustainable development, governance and the built environment sector, it was concluded in Section 2.4, that Objective 1 had been achieved. Thus, the main PhD research commenced to develop and test a theoretical governance framework that is relevant to all stakeholders and the sector as a whole, fulfilling the requirements of the research question.

The theoretical governance framework, developed from governance literature, (Chapter 4) required only minor adaptation when validated in the case study countries of UK and Ghana (Chapters 5 and 6). And, with 8 stakeholder groups included in the Stakeholder Component, it was concluded that the theoretical governance framework is relevant to individual built environment stakeholders and the sector as a whole; thus achieving Research Objectives 2 and 3.

Chapter 7 contained the final analysis, including examples of how the framework is used in practice, to determine that the Governance Framework is an effective mechanism for analysis and decision making for performance improvement. Therefore, concluding that Research Objective 4 has been achieved.

Of the anticipated outputs from the Research (1.4.3) Chapter 7 contains the output Governance Framework and policy guidance on how to use the framework and how its application can be extended with further research and development.

It is therefore concluded that the Research Project has achieved the Aim, objectives and outputs anticipated at the outset.

CHAPTER 8

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APPENDIX A

Preparation for contingent valuation

Programme for National Workshop with notes to Rapporteurs

Analysis presented in Chapter 6

CONFERENCE PROGRAMME

Day 1: Wednesday 27 October 2004:

08.00 a.m. Arrival and Registration of Participants

08.50 a.m. All Participants to be seated

Session 1: OPENNG CEREMONY

09.00 a.m. Introduction of Chairperson, Honourable Minister and Other Special Guests

9.10 a.m.: Welcome Address and Introduction to the theme of the Workshop - Prof. Ralph Mills-Tettey – Registrar, Architects Registration Council of Ghana.

09.20 a.m. Chairman's Opening Remarks
 – Engr. Nana Asafo-Boakye (Chairman, ABP Consult and Past President, Ghana Institution of Engineers)

09.30a.m. Address by President of the Ghana Institute of Architects
 – Mr. Steve Akuffo

09.40 a.m. Invited Presentation from National Governance Programme

09.50 a.m. Keynote Address: Leadership and Good Governance – Any relevance to the Construction Industry of Ghana? – Prof. Stephen Adei, Director General, Ghana Institute of Management and Public Administration (GIMPA)

10.10 a.m. Address by Hon. Minister of Works and Housing – Alhaji Mustapha Ali Idris

10.25 a.m. Announcements / Vote of Thanks

At the end of this Session, RAPPORTEURS will have:

- Collected all presentation material (where not previously available) and handed it over to the SECRETARIES for putting into electronic format

10.30 a.m. TEA / COFFEE BREAK

Session 2: LEAD PRESENTATIONS

11.00 a.m. Chairman – Mr. Charles Sagoe, President, Ghana Institution of Surveyors

Lead Presentations on Issues, Problems and Prospects affecting Respective Sectors:
Government / Ministry of Works and Housing Rep – Alhaji Alhasan Dawuni, Chief Technical Advisor, MWH
Professional Bodies – Representative from Ghana Institution of Engineers
Private Sector / Contracting Firms Rep – Mr. J. Nicco-Annan Director (Taysec)
District Assemblies – Mr. S. Y. Akoto, Ag. Municipal Engineer, TMA

(Each presentation will be between 10 and 20 minutes long)

12.30 p.m. Formation of Working Groups

Delegates will split into 4 working groups (determined by their roles in the sector) to develop and agree a vision and role for their stakeholder group – particularly identifying which of the key issues they could lead on. They are to explore key governance and development issues in the different sectors with a particular emphasis on identifying further problem areas and potential areas for improvement.

By the end of this session **GROUP CHAIRS** will have facilitated **DELEGATES** in:

- Choosing, or being allocated, a Group in which to work
- Knowing where each Group session is being held
- Having been informed about the key issues in each Group by the Lead Presenters
- Having been introduced to the briefing notes in their conference pack

By the end of this Session, **RAPPORTEURS** will have:

- Collected the presentation material from each of the Lead presenters
- Made an initial list of participants in their Group
- Helped to brief delegates in their respective Groups

1.00 p.m. LUNCH BREAK

By the end of Lunch Break, RAPPORTEURS in partnership with GROUP CHAIRS will have:

- Prepared flip charts and diagrams for the Groups Sessions that reflect the key governance issues presented by the Lead Presenters for their respective Groups

2.00 p.m. Group Discussions (Group chairpersons and Working groups as formed and outlined above)

In this Session, each Group will Identify, discuss and agree A Vision for their Group and potential Roles to achieve that Vision for each of the stakeholders included in their Group

Group #1 – Central Government, Good Governance and National Development in the Construction Industry

Group #2 – Professional Bodies, their Role in Good Governance and National Development

Group #3 - District Assemblies, Good Governance and National Development

Group #4 – Project Procurement and Implementation towards Good Governance in the Construction Sector

By the end of this session GROUP CHAIRS will have facilitated DELEGATES in:

- Identifying, discussing and agreeing a VISION for their Group
- Identifying, discussing and agreeing a set of ROLES for the main stakeholders in their Group
- Identifying a range of governance ISSUES that relate to the stakeholders in their Group for later discussion
- Discussing and agreeing the importance of those issues (where time permits)

By the end of this session, RAPPORTEURS will have:

- Recorded all discussions and dialogue
- Collected up Chairpersons notes, all flip charts, diagrams and other material used by participants in their Group
- Handed all materials to the Secretaries for typing up and putting in electronic format where necessary

3.00 p.m. Short Break

By the end of the Short Break, GROUP CHAIRS and RAPPORTEURS will have:

- Made sure that the main points of Session 3 have been drawn up into diagram form as a resource for the next Session

Session 4: FOCUS GROUP DISCUSSIONS II

3.30 p.m. Continuation of Group Discussion and Summaries of Points raised

In this Session delegates will aim to identify, discuss and agree:

The major barriers each Group will experience in achieving their Vision (agreed in Session 3)

Priority actions necessary for each stakeholder in the Group to overcome the barriers and/or achieve the Vision.

Group #1 – Central Government, Good Governance and National Development in the Construction Industry

Group #2 – Professional Bodies, their Role in Good Governance and National Development

Group #3 - District Assemblies, Good Governance and National Development

Group #4 – Project Procurement and Implementation towards Good Governance in the Construction Sector

By the end of this Session GROUP CHAIRS will have facilitated DELEGATES in:

- Identifying, discussing and agreeing, in order of importance, the main BARRIERS to achieving the prescribed Vision for their Group
- Identifying, discussing and agreeing, in order of importance, the priority ACTIONS necessary to overcome the barriers and/or achieve the prescribed Vision
- Discussing and agreeing how to handle the ISSUES that arose in Session 3

By the end of this Session RAPPORTEURS will have:

- Recorded all discussions and dialogue
- Collected up Chairpersons notes, all flip charts, diagrams and other material used by participants in their Group
- Handed all materials to the Secretaries for typing up and putting in electronic format where necessary

4.30 pm. (or later if necessary)

CLOSING FOR THE DAY

By close of play on the First Day (ASAP after the close of the day's proceedings) the CONFERENCE RAPPORTEUR, GROUP CHAIRS and RAPPORTEURS will:

- Review the information produced during the day to produce the GROUP REPORTS to be made in Session 5, on the 2nd day.
- Prepare presentation materials (powerpoint/flip chart/etc) suitable for Session 5
- Produce 1st Draft of the Conference Communiqué (to be discussed in Session 5 and finally presented in Session 6)

Session 5: PRESENTATION OF GROUP DISCUSSION REPORTS

– Chairman, President Ghana Institution of Engineers

9.00 a.m. Presentation of Report by Group Chairpersons and Rapporteurs

Group #1 – Central Government, Good Governance and National Development in the Construction

Group #2 – Professional Bodies, their Role in National Development and Good Governance

Group #3 - District Assemblies, National Development and Good Governance

Group #4 – Project Procurement, Implementation and Good governance in the Construction Sector

10.00 a.m. Facilitated discussion to identify and agree the Conference Communiqué, which will comprise:

- An overall Vision for the role of the built environment sector for governance and national development in the sector (including individual Group visions etc)
- Overall priority actions and a ranking of priority
- Who will be responsible for leading each action
- Common issues that could be addressed by more than one group
- Timescales

These discussions will be based on the Vision, Roles, Barriers and Priority Actions presented by each of the Groups in the first half of Session 5.

By the end of this Session, the CONFERENCE ORGANISER, CONFERENCE CHAIR and CONFERENCE RAPPORTEUR will have facilitated DELEGATES in:

Reviewing, the presentations, discussing and agreeing a VISION, ROLE and ACTIONS for the Sector as a whole

Reviewing and agreeing the VISIONS, ROLES AND ACTIONS proposed by each Group

Reviewing the draft Conference Communiqué to be presented in Session 6

By the end of this Session RAPPORTEURS will have:

- Recorded all discussions and dialogue
- Collected up Chairpersons notes, all flip charts, diagrams and other material used by participants in their Group
- Handed all materials to the Secretaries for typing up and putting in electronic format where necessary

11.00 a.m. TEA / COFFEE BREAK

By the end of this Tea/Coffee Break, a team comprising THE CONFERENCE ORGANISER, CONFERENCE CHAIRS, GROUP CHAIRS and CONFERENCE RAPPORTEUR will have:

- Finalised and written up the Conference Communiqué including Next Steps
- Prepared the presentation material for Session 6

Chairman – Nana Asafo Boakye (Chairman, ABP Consult and Past President, Ghana Institution of Engineers)

11.30 a.m. Workshop Rapporteur's Report of Proceedings

Chairman's summing up on Next steps

Reading of Communiqué and Presentation to Government Minister

Acceptance and Address by Hon. Minister of Parliamentary Affairs

Chairman's Closing Remarks

Vote of Thanks

1.30 p.m. END OF WORKSHOP AND CLOSING

REFRESHMENTS

APPENDIX B

Write up of Focus Group sessions at national workshop

Examples of Charting by Workshop participants

Analysis presented in Chapter 6

This APPENDIX contains the outcomes from the focus group sessions in two forms. In each group the overall outcomes are presented as a series of Issues/Vision/Actions for the specific Stakeholder Group. Because each group used a flip chart approach to capture ideas and present their conclusions the final flip chart presentations have been written up as well. The content presented in this APPENDIX was originally produced by the rapporteurs working in each working group.

Group 1 - Government and its Agencies

ISSUES

A Government as a regulator

- over emphasis on sectoral development with very minimum co-ordination
- Repetition of roles as a result of the establishment of MDAs (Multiplicity of MDAs)
- Government as a regulator (continued)
- Finance
- Multiplicity of Donors and their preferences for specific project does not allow for proper prioritization
- Inadequacy of internal funding
- Non-enforcement of rules and regulations even by the central government
- Lack of capacity on the part of development control agencies i.e. resources (human & material)
- There are too many laws regulating the sector – the need for harmonization and codification.

B Government as a Client

- Problem with Project Identification
- Maintenance of Projects
- So far, procurement is not a transparent process. But with the current procurement act (2003), we expect a more effective procurement management.

VISION should encompass:

- Develop policies and Programmes to guide the development of the built environment in both urban and rural areas.
- To set up structures and agencies to implement the policies and programme
- To develop and enforce rules and regulations governing the development of the built environment
- Creating an enabling environment for the development of the built environment
- Effective land administration (LAP)
- Strict enforcement of rules and regulations

Actions for Government

1 Develop Strategies for public awareness

- Workshops targeted at political leaders
- All groups responsible (professional bodies and civil society) will organise workshops lead by the ministry responsible for our sector

2A Review, consolidate and harmonize existing laws relating to the built environment

2 B Additional legislation to strengthen the environment Eg Laws on real estate development

3 Propose a more focused Ministry on the built environment Eg the Ministry of Housing and Human Settlement

- 4 Effective coordinating Mechanisms through a strong legislation which compels co-ordination at both policy and implementation levels
 - A improve procurement procedures
 - B staff motivation
- 5 Strengthen enforcement regulation at the policy and implementation level
 - A - All MDAs must establish training policies based on needs assessment
Government should resource interns of equipment, manpower, etc
Action for Governments
 - B – strengthen institutions that train built environment professionals
 - C – Intermediate professionals training (in all professions) should be introduced at the polytechnic level
 - D – introduce and strengthen CPD in all MDAs
- 6 Monitoring and evaluation of implementation using the existing laws as reference points - All MDAs must introduce operational M & E systems
- 7 Continuous public awareness programs through Workshops like this and the Media
- 8 Public service performance improvement programme – developing a code of conduct on methods of service delivery
- 9 Encourage the ongoing Land Administration Programme - Objective is to harmonize the operations within the land sector
- 10 National Human Settlement policy which will provide the framework for managing the national urbanisation and settlement patterns through inter-ministerial bodies
- 11
 - A - Education and Sensitisation
 - B – Continuous public awareness programme
 - C – introduction of participatory approaches in the built environment sector

GROUP 1 – Government and its Agencies - FLIP CHART

1. ISSUES AS A REGULATOR

A

- OVER EMPHASIS ON SECTORAL DEVELOPMENT WITH VERY MINIMUM CO-ORDINATION
- REPETITION OF ROLES AS A RESULT OF THE ESTABLISHMENT OF MDAs (MULTIPLICITY OF MDAs)
- FINANCE - MULTIPLICITY OF DONORS AND THEIR PREFERENCES FOR SPECIFIC PROJECT DOES NOT ALLOW FOR PROPER PRIORITIZATION.
- INADEQUACY OF INTERNAL FUNDING
- NON-ENFORCEMENT OF RULES AND REGULATIONS EVEN BY THE CENTRAL GOVERNMENT.
- LACK OF CAPACITY ON THE PART OF DEVELOPMENT CONTROL AGENCIES - RESOURCES (HUMAN AND MATERIAL)
- THERE ARE TOO MANY LAWS REGULATING THE SECTOR - NEED FOR CODIFICATION AND HARMONIZATION

B) GOVERNMENT AS A CLIENT

KEY ISSUES

- PROBLEM WITH PROJECT IDENTIFICATION
- MAINTENANCE
- SO FAR, PROCUREMENT IS NOT A TRANSPARENT PROCESS BUT WITH THE CURRENT PROCUREMENT WE EXPECT A MORE EFFECTIVE PROCUREMENT MANAGEMENT

Group 2 Local Government (District, Metropolitan and Municipal assemblies)

Issues

- Most officials are on secondment
- Lack of clearly defined roles between central Gov an MA's and DA's
- Financial subserviance of local Gov to central Gov
- Inadequate number of qualified professionals and well qualified personnel in the Assemblies
- Inarticulate civil society.
- Lack of involvement of professional bodies in organization of Assemblies
- Reluctance of DA's to welcome professional bodies
- Falling standards in the architectural professions
- Breakdown between DAs and residents of the district
- Lack of supervision and enforcement of laws
- Critical Roles
- DAs should be more pro-active in cooperating with professionals bodies
- DAs should be more ready to privatise their functions
- Roles of DAs should be reviewed and redefined periodically, eg
- Building inspectorate, education of communities, revenue collection, finance
- DAs should prepare physical planning schemes
- (Only 64 planners in Ghana – gap in training)
- Assemblies should facilitate the production of base maps
- DAs should review their laws and regulations to reflect change in technology and demographics

Vision

- Ensure overall improvement of the built environment
- DAs should encourage community based organisations to participate more fully in local governance eg (Watchdog committees)
- DA's should ensure in their planning a better integration of social groups

Key Actions for Local Government

- DAs should take steps to be more representative of their residents in the city to ensure they have the proper political platform to implement their decisions
- eg the CE and Assembly members should be elected not appointed by govt.
- DA's should take steps to appoint Deputy Mayors who are technocrats to assist the Mayor in making technical decisions
- DAs should create more avenues for communicating with Civil Society and communities
- DAs should take steps to strengthen their sub districts and sub metros to make them more efficient (ie Area and Urban councils)
- DAs should take steps to generate funds (revenue generation and collection) in order not to depend on central government

B4/GROUP 2 LOCAL GOVERNMENT – FLIP CHART:

LOCAL GOVERNMENT

1. MAIN ISSUES AFFECTING: GOVERNANCE

1. Most officials of the Assemblies are on secondment.
2. Lack of clearly defined roles between central Government and District Assemblies
3. Financial subservience of local Government to central Government
4. Inadequate no. of qualified professionals in the Assemblies
5. Inarticulate civil society.
Lack of well qualified personnel
6. Lack of involvement of the GIA in Organization of District Assemblies (ALL PROFESSIONAL BODIES)
7. Reluctance of District Assemblies to welcome the Professional Bodies
8. Fallen standards in the Architectural Profession
9. Break down in communication between District. Assemblies and residence of the District
10. Lack of supervision and enforcement of laws

2. CRITICAL ROLES FOR LOCAL GOVERNMENT

1. District. Assemblies should be more proactive in co-operating with professional bodies
2. District Assemblies should be more ready to privatise some of their functions.
3. Roles of District Assemblies should be reviewed and re-defined periodically eg.
 - Building Inspectorate; Education of Communities; Revenue Collection; Finance
4. District Assemblies should prepare physical planning schemes – There are only 64 physical planners in the country.
 - The Assemblies should facilitate the production of base maps and planning schemes

5. District Assemblies should review their laws and regulations periodically to reflect changing technics and demographics.

VISION

ENSURE OVERALL IMPROVEMENT OF THE BUILT ENVIRONMENT

District Assemblies should encourage community based organizations to participate more fully in Local Governance.

Eg. Watch dog committees

- District Assemblies should ensure in their planning a better integration of social groups.

KEY ACTIONS

1. District Assemblies should be more representative of the residents in the city and must have the proper political platform to implement their decision. Eg. The Chief Executive and Assembly members should be elected Deputy mayors and should be appointed.
2. Deputy Mayors should be technocrats who will help the mayor.
3. District Assemblies should create more awareness for communicating with civil society and communities.
4. District Assemblies should strengthen the sub districts and sub metros to metros to make them more efficient.

Area and Urban Councils

5. District Assemblies should work harder to generate funds in order not to depend on central Government.

Group 3 Professional Bodies

Key Issues

- Lack of Classification of consulting firms
- Sole practitioner vs large practice
- Professional Bodies lack legal backing
- Architects only recognised in law
- Registration of individuals and firms by the reputable bodies
- Fee structure
- Minimum fee scales
- Role and Relationships
- Bridge between regulations and clients
- Help harness the aspirations of client and investors
- General satisfaction with most stakeholder relationships, but:
- Professionals want to reach individual home owners as well
- Professionals want to influence course contents with education providers

Vision - with intent to achieve the following:

- Enforcing existing professional standards
- Modernizing professional ethics
- Improving transparency
- Prepare for the future
- Train young professionals
- Continue training of existing professionals
- Contribute to the formation of national policy for the built environment
- Body to control the built environment professionals
- Barriers, Needs and responsibilities
- Non existent national settlement policy
- Inconsistent/unreliable (class-based) selection processes

Actions For Professionals

- Promote attachments for trainees
- (maintain continuity of profession specifically quality)
- Create a coordinating body (Apex) comprising representatives of the built environment sector
- Set up a monitoring 'institution' to review and check on the compliance of firms to professional standards and quality in the built environment
- In-house pilot check of standards and quality (by individual firms)

GROUP 3 PROFESSIONAL BODIES FLIP CHART

AIMS
ROLE
BARIERS
ACTION

PROFESSIONAL AIMS

Professional Practice needs to be classified (existing Finance with respect to with respect to Contractors)

Others to be considered - PERSONNEL, SKILLED EQUIPMENT HOLDING

2. PROFESSIONAL PRACTICE NEED LEGAL BACKING ADVANTAGE

- CONTROL WITH AUTHORITY
- ALLOW SERVICE PROVIDERS TO CLASSIFY TO CONTROL 2QUALITY AND ETHICS
- TO CONTROL QUALITY AND ETHICS
- REGISTRATION OF INDIVIDUAL/COMPANIES BY PROFESSIONAL BODIES
- INCLUDING EXPATRIATES BODIES
- STREAMLINE SELECTION PROCESSES TO IMPROVE QUALITY
- WHO IS TO BE INVITED FOR TENDERING BASED ON YOUR CLASS.

3A FEE STRUCTURE (SET A BASE LINE FOR FEES WORKED ON PERCENTAGES)

- NOT TO SACRIFICE QUALITY FOR CHANGES)

4. PROFFESIONAL BODIES SHOULD BE AWARE OF LAWS AND PROCEDURES FOR PROJECTS

- ZONING
- LAND USE
- IMPLEMENTATION/ CONDITIONS
- CONSTRUCTION STANDARDS TO CHECK HAHARZARD DEVELOPMENTS
- NON-EXISTENT NATIONAL SETTLEMENT POLICY

3A FEES BASED ON MANUAL HOURS, WORKDONE AND SCOPE OF WORK

- NO DISCRIMINATION BETWEEN FEES OF LOCALS AND INTERNATIONAL BODIES/ORGANISATION.

1). PROFESSIONAL BODIES

- INFLUENCE COURSE CONTENT OF THE VARIOUS INSTITUTIONS
- ATTACHMENTS
- CONTROL OF PROFESSIONALS W.R.T
- QUALITY DELIVERY
- ADDITIONS:- PRIVATE INDIVIDUAL; ROLES AND RESPONSIBILITY: (VISION); TRAINING OF YOUNG PROFESSIONALS; CONTINUE TRAINING OF EXISTING STAFF (REFRESHER COURSES); ATTAINING LOCAL HEIGHTS TO COMMITTEE INTERNATIONALLY; TAKE AN ACTIVE ROLE TO CONTROL ISSUES CONCERNING THE BUILT INDUSTRIES
- BODY TO CONTROL THE BUILT ENVIRONMENT WHICH COMPRISE THE FOUR MAIN PROFESSIONAL BODIES, (ARCHITECT, MEMBERS OF INSTITUTES OF SURVEYORS, PLANNERS, ENGINEER)

Group 4 Private Sector

Issues

- Public sector roles generate mistrust where there are certain regulations that divide the enabling environment (ie for the private sector)
- Inadequate accountability and transparency in project commitment and procurement in government
- Use of resources is generally unregulated
- Land, natural resources, human capital, plant
- Private sector roles (profit) – mean that many roles with different rules apply with problems due to lack of transparency
- Lack of private sector participation in public sector decision making
- Poor payment record of government and inadequate budgeting
- Private sector lack product improvement and development due to low application/use of research outputs
- Imposition of low fees for consultants by government
- unfair pressure to drive down professional fees as part of public procurement
- Fragmented regulatory agencies, for example:
- EPA+DA+LC+LTR+LVB
- Slow approval processes
- The profile of small consulting and manufacturing firms and low coordination
- Roles and responsibilities
- Ensure transparency and accountability in project initiation and commitment/ procurement and award

Vision

- To provide services/goals using efficient professional practices to ensure that clients get best value for investment within the environment of transparency, accountability and participation.
- Actions for the private sector
- foster relationships between Research institutions and the private sector
- Seek to contract work from Ministries and Assemblies
- Foster relationships with land owners to encourage partnerships with private sector
- Implement improvements in health, safety and working conditions on site

FLIP CHART - THE PRIVATE SECTOR

MAIN ISSUES

- ACHIEVEMENT OF BUILDINGS UNDER
- RULE OF LAW
- TRANSPARENCY

- ENABLING ATMOSPHERE TO BE PROVIDED BY GOVERNMENT

- GOVERNMENT AS A REGULATOR – SET STANDARDS
(LANDS)

WHERE GOVERNMENT IS A CLIENT, THERE IS CONFLICT – MONOPOLY
ENSURE FAIR PLAY

PRIVATE SECTOR

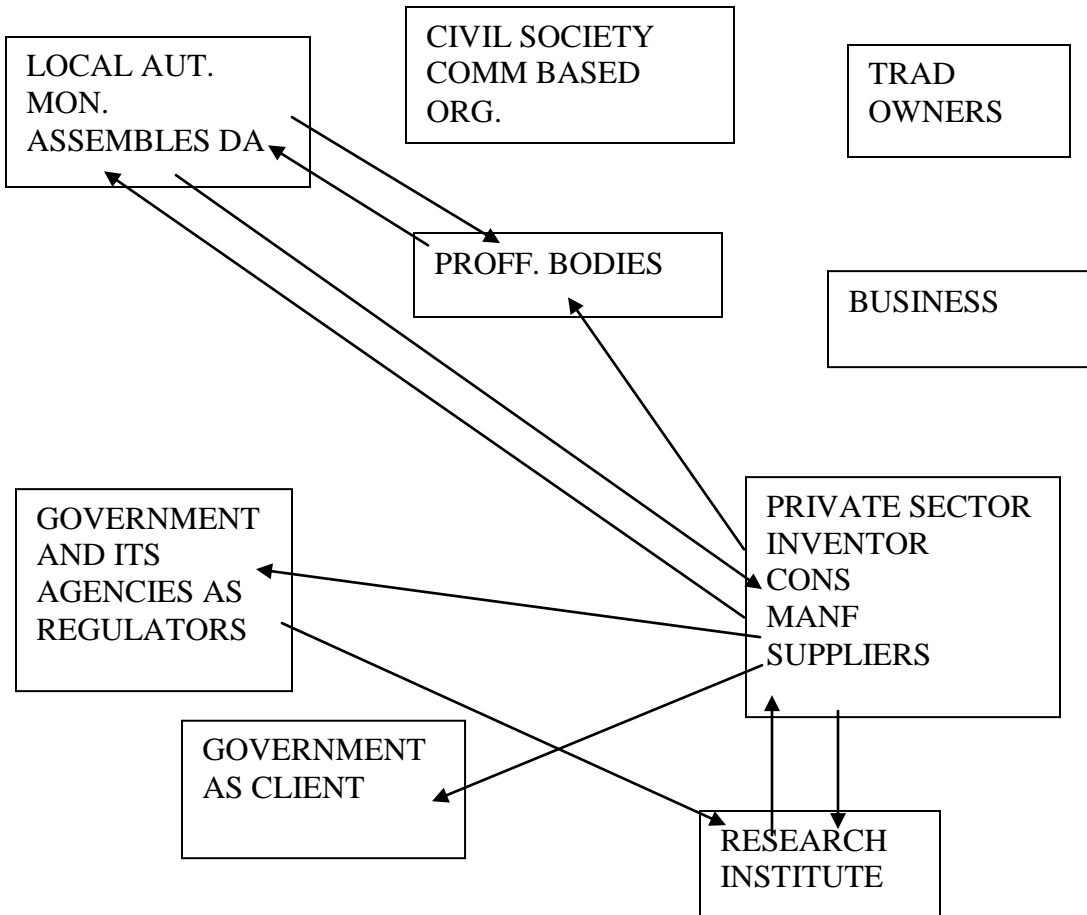
1. USERS

- CLIENTS
- CONTRACTORS
- ROLES OF GOVERNMENT
- GOVERNMENT TO PUT IN REGULATIONS AND ENSURE
ENFORCEMENT
- GOVERNMENT TO CONSOLIDATE REGULATION. EPA AND AMA –
FOR PERMIT
- GOVERNMENT TO EDUCATE ON REGULATION
- GOVERNMENT PROCESS ARE SLOW (REVIEW ARCHAIC PROCESSES)

PRIVATE SECTOR INTERRELATION

1. SOLE PROPRIETORS (90%)

- CLIENT IMPOSE FEES
- PRIVATE SECTOR TO FORM GROUPS AND ASSOCIATIONS
- MAKE THEIR OWN REGULATION AND LAW
- POLITICAL PLAYS ON JOB PROCUREMENT



LACK OF INTEREST OF GOVERNMENT IN RESEARCH

PROFESSIONALS TO HAVE LI's. - NO REGISTRATION COUNCILS FOR
PLANNER AND SURVEYORS

VISION

1. TOP QUALITY SERVICES. TRAINING
VALUE FOR MONEY STANDARDS

2. PARTNERSHIPS - EDUCATION ON PARTNERSHIP

VISION

- TO PROVIDE SERVICES USING EFFICIENT PROFESSIONAL PRACTICE
TO ENSURE THAT THE CLIENT GETS THE BEST VALUE FOR THEIR
INVESTMENT WITHIN THE ENVIRONMENT OF TRANSPARENCY,
ACCOUNTABILITY AND PARTICIPATORY PROCESSES.

3) DEVELOPING A VISION

THE ROLE OF GOVERNMENT.....

I) DEVELOP POLICIES AND PROGRAMMES TO GUIDE THE DEVELOPMENT OF THE BUILT ENVIRONMENT IN BOTH URBAN AND RURAL AREAS

II) TO SET UP STRUCTURES AND AGENCIES TO IMPLEMENT THE POLICIES AND PROGRAMMES

III) TO DEVELOP AND ENFORCE RULES AND REGULATIONS GOVERNING THE DEVELOPMENT OF THE BUILT ENVIRONMENT

IV) CREATING AN ENABLING ENVIRONMENT FOR THE DEVELOPMENT OF THE BUILT ENVIRONMENT

V) EFFECTIVE LAND ADMINISTRATION (LAP)

VI). STRICT ENFORCEMENT OF RULES AND REGULATIONS

4). BARRIERS TO CHANGE

- A lack of political commitment and leadership – **NEED** To provide political commitment and leadership **WHO SHOULD TAKE THE RESPONSIBILITY:** The Government, Professional Bodies, Civil Society; What are the ACTION NEEDED
- A lack of openness and co-operation between departments ministries and agencies; **WHO SHOULD TAKE RESPONSIBILITY? -** Sector Ministries

APPENDIX C

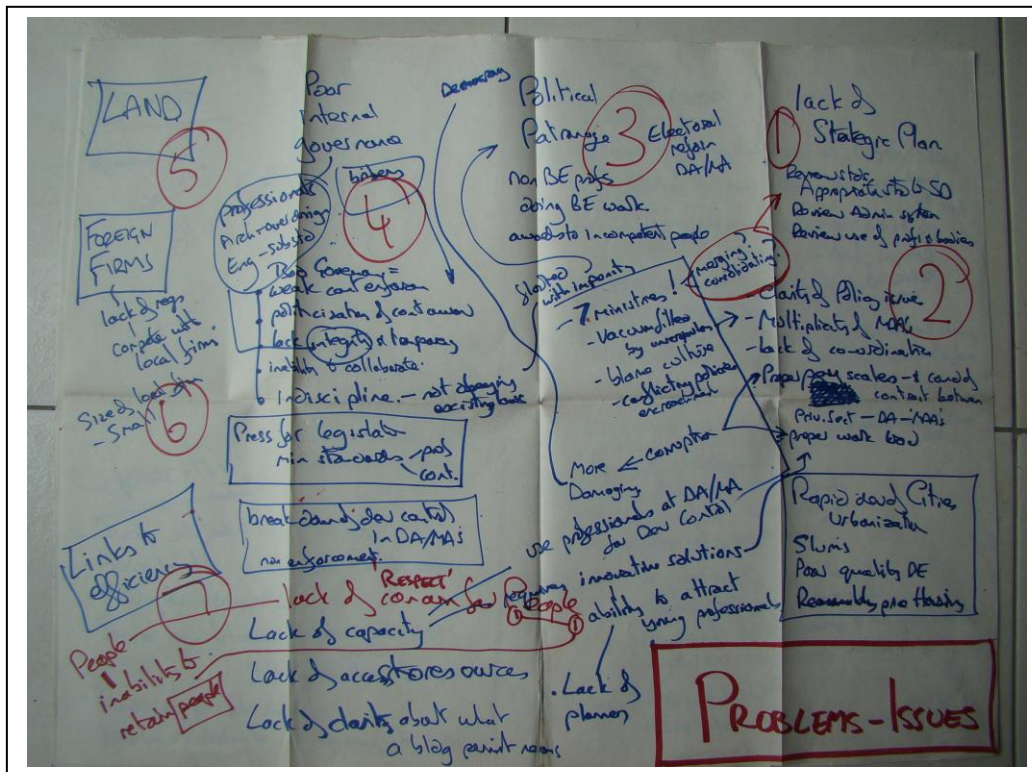
Illustration of Charting Technique

Analysis of qualitative data collected in Speaker's Papers.

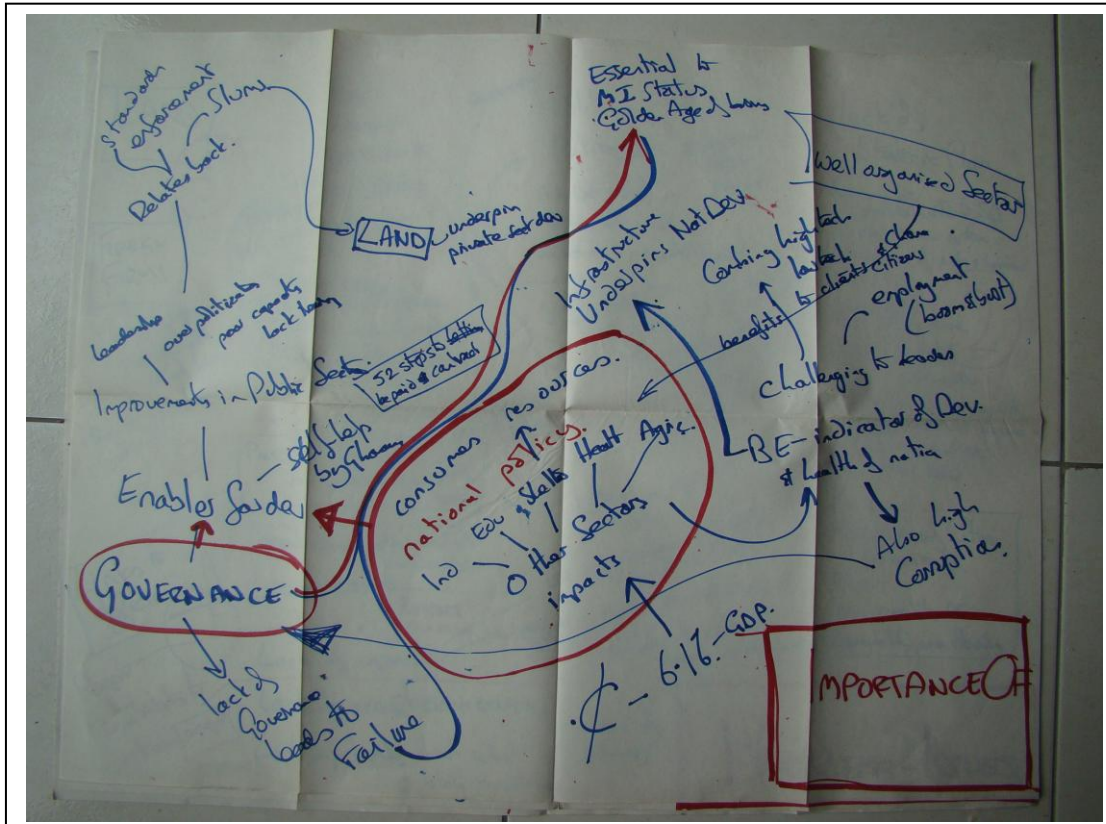
Analysis presented in Chapter 6

The following photographs show the charts created by the author in the analysis of data collected from the 11 speaker's papers presented at the national workshop in Ghana.

A collection of 'problems' and 'issues' identified by speakers



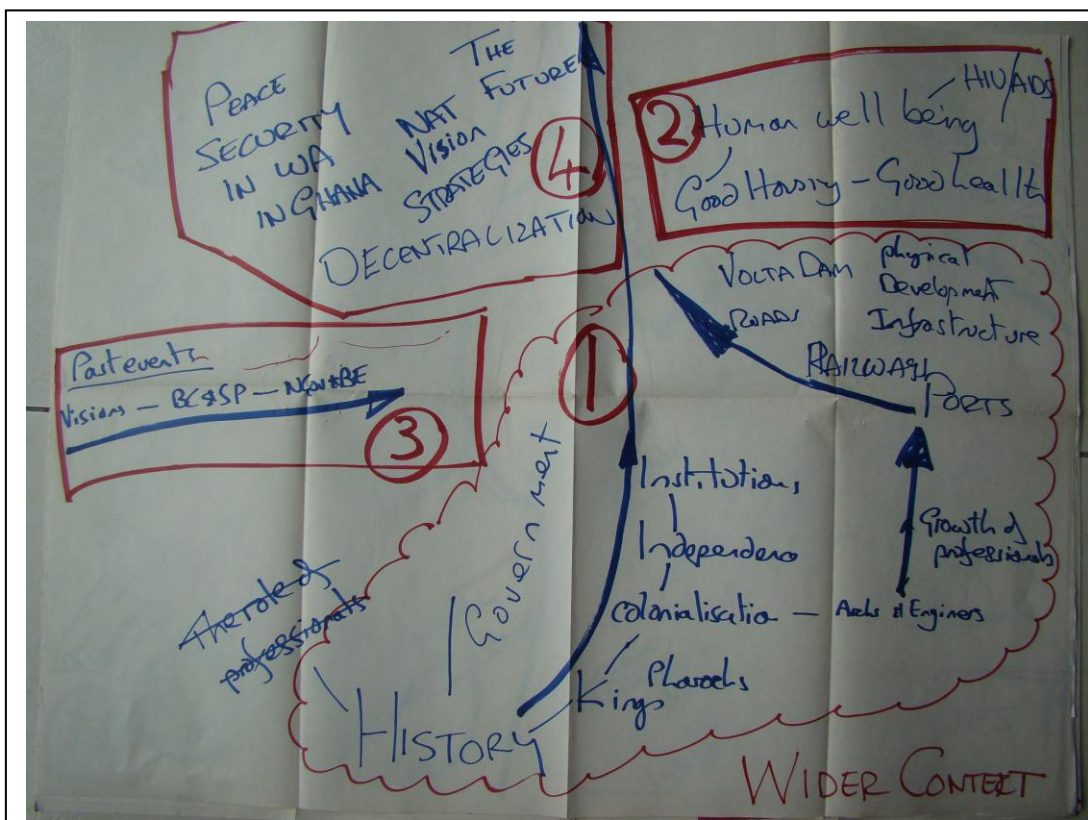
Comments indicating the 'importance of Governance'



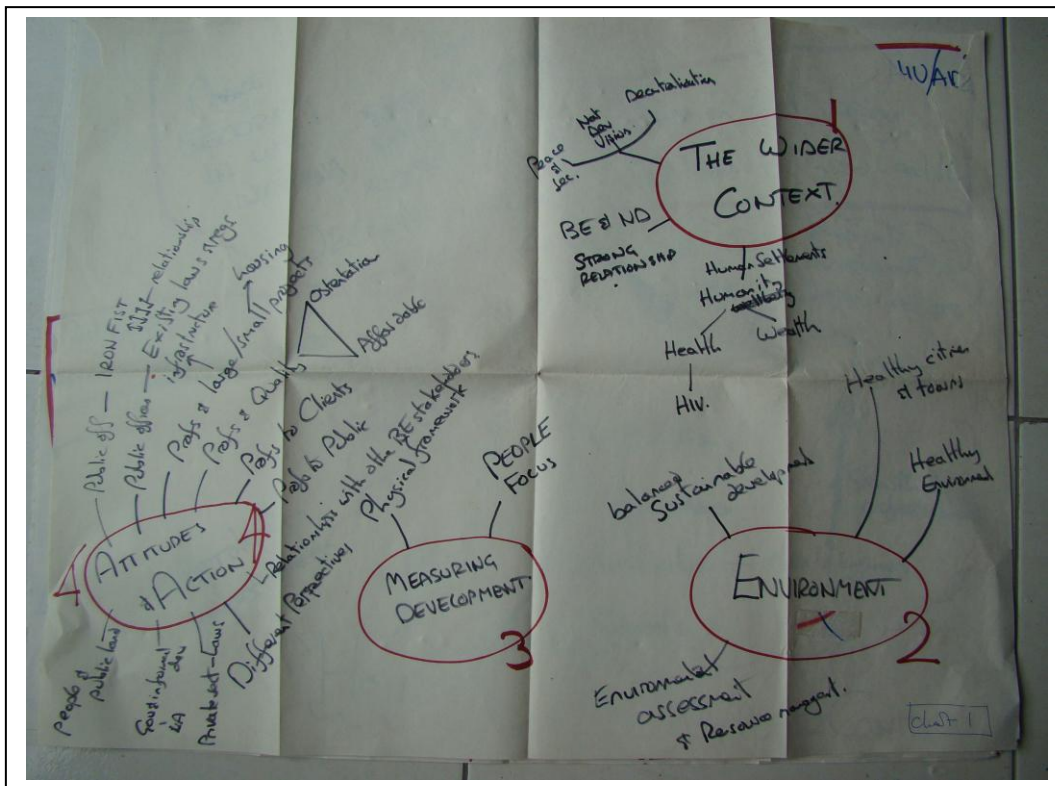
A collection of attitudinal issues raised by speakers



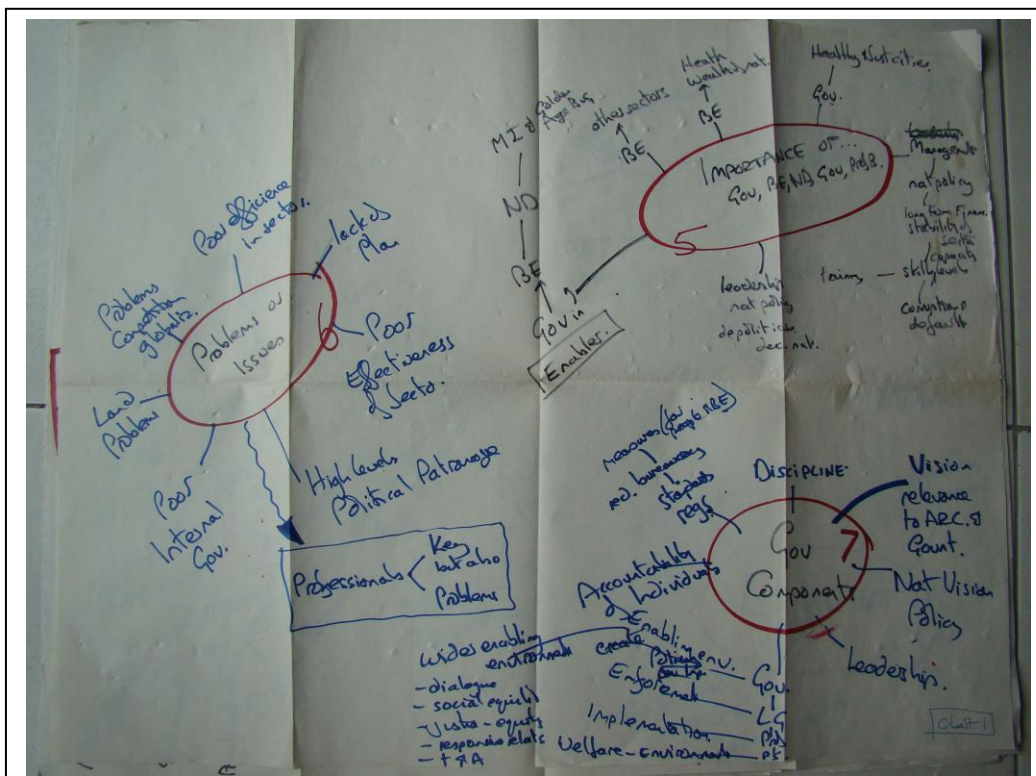
A range of issues raised by speakers seen as contributing to wider context



Collection of issues under the headings of: the wider context; environment; measuring development; attitudes and actions



Collection of issues under the headings of: problems and issues; importance of Governance; governance components



Final compilation of issues grouped into the 4 components of the governance framework

